



Millennium Development Goals &
The Federated States of Micronesia
Status Report 2010



Prepared by the FSM Office of Statistics, Budget and Economic Management, Overseas Development Assistance, and Compact Management in cooperation with the FSM Millennium Development Goals Task Force with Financial and Technical Support from the United Nations Development Program

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Preface

It has been ten years since the Federated States of Micronesia signed the Millennium Declaration and committed the nation to the principles of human dignity joining other countries' leaders to work for a world free from poverty and hunger and to promote better education, health and environmental sustainability. As 2015 approaches, it is timely to disseminate our progress towards achieving the Millennium Development Goals (MDGs).

I am honored to present the first MDG report of the Federated States of Micronesia. It is a result of the acknowledged efforts taken by representatives of national and state governments to explain to the people of the FSM where we, as a nation, stand in terms of poverty, education, gender, health, environment and global partnership – all eight MDGs.

The Office of SBOC, as the project manager of the “Millennium Development Goals Capacity Building in Federated States of Micronesia,” coordinated the preparation of this report in cooperation with the MDG Task Force. The MDG Task Force which was created in 2004 had the responsibility for compiling data and qualitative information for the initial status report and provided the appropriate connection with the Strategic Development Plan (SDP) goals and priorities. Linking the MDGs with the SDP will be feasible through a coordinated approach between the national and state departments, offices and agencies, private sector, NGOs and civil society organizations that ultimately aim to promote economic growth with equitable distribution of income.

Economic growth and equality of income distribution are at the very heart of poverty reduction and therefore are directly relevant to the MDGs. Where growth rates are positive and sustainable, reductions in the number of households and individuals facing hardship are likely to be seen. A negative growth rate may adversely affect people's lives, pushing them into socioeconomic exclusion. As we may know, growth is being acknowledged as a necessary, but not sufficient condition for reducing poverty, hardship, and hunger.

This report addresses the above issues and was written in accordance with the findings resulting from extensive data collection at both national and state level, and a comprehensive analysis process that ultimately identified challenges and priorities for achieving the MDGs. It will allow national and state government representatives and key stakeholders to make better use of available data and qualitative information as a basis for evidence-based policy making.

I am pleased to confirm that the Federated States of Micronesia is generally on-track regarding MDG Goals 2, 7 and 8. MDG Goals 3, 4 and 6 are partially on track and progress is expected in the areas of gender and children's health and non-communicable diseases, for example, in the forthcoming years. However the report does indicate that FSM will not be able to achieve MDG Goal 1, the eradication of extreme poverty and hunger, and MDG Goal 5, improve maternal health, by the given deadline. The main challenge is to develop a formal poverty alleviation strategy in accordance with our expected macroeconomic conditions in the medium and long term. We hope our efforts will contribute in ensuring a better livelihood for our people.

Lastly, I wish to express that we will continue to pursue these goals and will work closely with state governments and key stakeholders to build more awareness about them in the FSM. Moreover, we will facilitate the implementation of the MDGs by integrating their targets and indicators within our planning and budgeting processes for continued monitoring and evaluation of our progress in achieving the goals by 2015 and beyond.

Emanuel “Manny” Mori
President of the Federated States of Micronesia

Foreword

Since the signing of the Millennium Declaration in 2000, the Federated States of Micronesia (hereinafter, FSM) has made progress towards the Millennium Development Goals (MDGs). Most of the MDGs' targets were not new but represented goals that leaders and decision makers were already collectively committed to achieve and sustain in the long term. This is because the MDG's represent basic social and economic development benchmarks and a better standard of living for the people of the FSM.

This report represents the first FSM's comprehensive report on the MDGs. It is designed to raise awareness about the MDGs at home while informing the global community about progress since 1990s. The report provides important baseline data from where future progress in human resource development and economic development may be measured and further gave us a glimpse of what has been accomplished since 2000. It indicates that significant progress has been made toward the goals and their 21 supporting targets and 60 indicators. Some goals and targets have already been achieved, while others are "on track" to be achieved by 2015.

While much progress has already been made, some challenges still remain. At least one goal (poverty reduction) poses great challenges within the context of the poverty definition applicable to the Pacific Islanders. There is indication in the report that the FSM is "off track" with respect to achieving the needed targets for this goal by 2015. Progress, however, can be made by identifying a less challenging localized target that is achievable over a five year timeframe. While MDG 2 has been virtually achieved, care is, however, needed to prevent regression. MDG 4 is slightly off-track and 5 is "off track" but with carefully targeted interventions are achievable. MDG 3 has been partially achieved (participation of girls in school). While further progress is expected by 2015 with respect to economic and political targets, FSM may not achieve full gender equality by 2015. To combat these challenges would require strong political will, further localization of the MDGs, and further expansion of the "ownership" of the MDGs beyond the national arena to include state governments and civil society.

The global challenges we face today transcend boundaries and affect us all. Through the interconnectedness of the financial system, through the environmental cycle, and through a number of other linkages, we have all become global stakeholders joining other nations of the world in attempting to deal with the MDGs. The achievements of the MDGs are very possible. With political will, adequate resources and concerted efforts of the national and state stakeholders the Millennium Development Goals will be met by 2015. The completion of this report is a milestone. Now the real work begins of aggressively accelerating efforts to move the FSM as far as possible toward achieving the MDGs in the five years remaining before 2015. This work will require simultaneous action on the following fronts:

- 1) **The expansion of the "ownership" of the MDGs** must go beyond the national government to the state and municipal governments. The national government has set the stage for implementation but most of the implementation work required to achieve the MDGs will take place at the state level or in some cases at the community or municipal level.
- 2) Further **localization of the MDGs** is needed. The process of localization has already begun with this report. A critical review of the current indicators is new with the view toward selectively adding indicators that are important for monitoring and the priorities of the FSM.
- 3) **Communication and public education on the MDGs** are needed.
- 4) **Monitoring** of the MDGs should be aggressively pursue. It is important that the MDG Task Force(s) keep pace with the development by ensuring information is available to continuously monitor implementation status.
- 5) **The implementation** of the MDGs is already a part of the national and state programs and activities. The implementation work, as alluded to above, needs to be reinforced and monitored aggressively.

On behalf of the Government of the Federated States of Micronesia, we would like to acknowledge the valuable financial and technical support provided by the United Nations Development Programme (UNDP) through the MDG Capacity Building Initiative project, without which the success of completing this report would not have been possible. We would also like to acknowledge the comments provided by various UN Agencies and Development Partners on previous draft versions of the MDG report, drawing from their specific areas of expertise, and ensuring the substantive quality reflected in the Initial MDG Assessment Report. We wish to extend our gratitude to the MDG Task Force members for their work and commitment that ultimately have led us to move forward with the project, to Ms. Judy Otto, the consultant to the MDG report and to Cecilia Azevedo Sodre (UNV) who assisted the government to implement the project in the FSM.

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Author's Note

To the extent possible, the most recently available statistics are used throughout this report. Between the dissemination of the final draft of the report for comment in September 2010 and finalization of the report in December 2010, the FSM Government published provisional population counts derived from the 2010 census. These provisional counts have been integrated into this MDG report but because no other census data are available as of December 2010, all other statistics, figures, and tables continue to utilize pre-2010 data, including in some cases the 2000 census data.

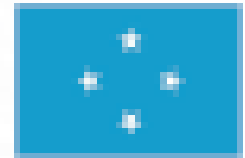
Acronyms and Abbreviations

ABS	Areas of Biological Significance
ADB	Asian Development Bank
AIDS	Acquired Immunodeficiency Syndrome
BFHI	Baby Friendly Hospital Initiative
BNPL	Basic Needs Poverty Line
BPOA	Barbados Program of Action on the Sustainable Development of SIDS
CDC	Centers for Disease Control
CEDAW	Convention on the Elimination of all forms of Discrimination Against Women
CITIES	Convention on International Trade in Endangered Species
CNMI	Commonwealth of Northern Mariana Islands
CO ₂	Carbon dioxide
COFA	Compact of Free Association
CRC	Convention on the Rights of the Child
DAC	Development Assistance Committee
DOE	Department of Education
DHSA	Department of Health and Social Affairs
DOTS	Directly Observed Short Course (treatment program for tuberculosis)
EC	European Commission
EPA	Economic Partnership Agreement
EPI	Expanded Program of Immunization
EQPB	Environmental Quality Protection Board
EU	European Union
FDI	Foreign Direct Investment
FICs	Forum Island Countries
FPL	Food Poverty Line
FSM	Federated States of Micronesia
FSMTC	FSM Telecommunications Corporation
GAO	General Accounting Office (investigating arm of the U.S. Congress)
GDP	Gross Domestic Product
GEF	Global Environment Facility
GIS	Geographic Information System
Gg	Gigagrams
GNI	Gross National Income
HCFC	Hydrochlorofluorocarbon
HIES	Household Income and Expenditure Survey
HIV	Human Immunodeficiency Virus
IMR	Infant Mortality Rate
IUCN	International Union for Conservation of Nature
JEMCO	Joint Economic Management Committee
KBSAP	Kosrae Biodiversity Strategic Action Plan
KIRMA	Kosrae Island Resource Management Authority
LDC	Least Developed Country
MCH	Maternal and Child Health

MDR	Multi-drug resistant
MDRI	Multilateral Debt Relief Initiative
MDGs	Millennium Development Goals
MMR	Maternal Mortality Ratio
MSI	Mauritius Strategy for Implementation
MSY	Maximum Sustainable Yield (in relation to fisheries management)
NBSAP	National Biodiversity Strategic Action Plan
NCDs	Non-communicable Diseases
NGO	Non-Governmental Organization
ODA	Official Development Assistance
ODS	Ozone Depleting Substances
OECD	Organization of Economic Cooperation and Development
PACER	Pacific Agreement on Closer Economic Cooperation
PAH	Participatory Assessment of Hardship
PBSAP	Pohnpei Biodiversity Strategic Action Plan
p.c.a.e.	per capita adult equivalent
PGI	Poverty Gap Index
PICTA	Pacific Island Countries Trade Agreement
PNG	Papua New Guinea
PPP	Purchasing Power Parity
RMI	Republic of the Marshall Islands
SBEA	South Pacific Board of Educational Assessment
SBOC	FSM Office of Statistics, Budget and Economic Management, Overseas Development Assistance, and Compact Management
SDP	Strategic Development Plan (of the FSM)
SIDS	Small Island Developing States
SPARTECA	South Pacific Regional Trade and Economic Cooperation Agreement
SPC	Secretariat of the Pacific Community (formerly South Pacific Commission)
SPGI	Squared Poverty Gap Index
SPREP	South Pacific Regional Environment Program
SRH	Sexual and Reproductive Health (Services)
STI	Sexually Transmitted Infections
TFR	Total Fertility Rate
TNC	The Nature Conservancy
TSM	Temporary Special Measures (to advance the status of women)
TTPI	Trust Territory of the Pacific Islands
U5MR	Under 5 Child Mortality
UN-AIDS	United Nations Programme on HIV/AIDS
UNICEF	United Nations Children's Fund
UNDP	United Nations Development Program
UNESCO	United Nations Educational, Scientific, and Cultural Organization
UNFCCC	United Nations Framework Convention on Climate Change
UNFPA	United Nations Fund for Population Activities
USEPA	US Environmental Protection Agency
WHO	World Health Organization



Federated States of Micronesia Initial Report on the Status of the MDGs (2010) Executive Summary



1. Introduction

In September 2000, world leaders came together at the United Nations to declare unequivocally that the time had come for all nations - rich and poor, south and north, east and west - to unite together behind a common vision of a world free from poverty and its worst manifestations - hunger, disease, and lack of education. From their resolve emerged the Millennium Declaration and the eight Millennium Development Goals (or MDGs as they are better known).

The 8 Millennium Development Goals have been endorsed by all 192 member countries of the United Nations and at least 23 international organizations making them the most widely held statements of global resolve thus far in human history.

Shortly after the 2000 summit, the United Nations Secretary General noted:

“Most of the targets set by the Millennium Declaration were not new. They derived from the global conferences of the 1990s and from the body of international norms and laws that had been codified over the past half-century. Moreover ... plans of action needed for reaching these targets have, for the most part, already been developed and formally adopted.... What is needed, therefore, are not more technical or feasibility studies. Rather, States need to demonstrate the political *will* to carry out commitments already given and to implement strategies already worked out.”

The FSM participated in the Millennium Summit and is a signatory to the Millennium Declaration. For the FSM also, the MDGs are not new. These goals have been part of the FSM’s development agenda even predating independence and are part of the FSM Strategic Development Plan for 2004-2023.

Millennium Development Goals

The eight Millennium Development Goals are supported by 21 targets and 60 indicators (see comprehensive list on page xvi). The eight goals:

	Eradicate extreme poverty and hunger
	Achieve universal primary education
	Promote gender equality and empower women
	Reduce child mortality
	Improve maternal health
	Combat HIV/AIDS, malaria, and other diseases
	Ensure environmental sustainability
	Develop a global partnership for development

In 2004, former President Joseph Urusemal created a MDG Task Force with the dual responsibilities of reporting on progress to achieve the MDGs and mobilizing the resources of government and civil society to achieving, insofar as possible, all of the MDGs by the 2015 target date. Significant progress has been made toward the goals and their 21 supporting targets and 60 indicators. Some goals and targets have already been achieved; others are “on track” to be achieved by 2015; while at least one (poverty reduction) poses great challenges.

2. Methodology

In 2004, the MDG Task Force conducted an inventory of data available and relevant to the MDG targets and indicators. Six years later, the group finalized the work and found out that 44 indicators could be assessed directly. It was also possible to use proxy data to assess an additional two indicators. Four indicators, however, couldn't be assessed and therefore are not part of this report (see Section 1.1).

3. Summary of findings

Poverty reduction lies at the heart of the Millennium Declaration – the common threat uniting all the MDGs. The **MDG 1** (Poverty, hardship, and hunger) has three targets: reduce poverty; achieve full employment; and reduce hunger.

With a bountiful natural resource base and a strong tradition of “caring and sharing” through the extended family, poverty is a new concept to many Micronesians. Ideas about what constitutes a “good” life are changing; many people are no longer content with simple island subsistence.

The need to purchase items now considered “essential” and to pay cash for health care, schooling, power, water, transportation and communications have created demands for cash income and wage salary jobs. At the same time, the physical environment is coming under stress; the sea and land are no longer as productive as in the past; increasingly even subsistence requires at least some capital.¹

According to the 1998 and 2005 Household Income and Expenditure Survey (HIES) for the FSM, poverty rates increased although not dramatically. In 2005, across the FSM, 1-in-4 households and 1-in-3 individuals lived below the basic needs poverty line.² Households headed by women³ and persons with low levels of education were at heightened risk of poverty. Seventy eight per cent of poor households had at least one working member, a relatively high level of “working poor” reflecting low wages amid high living costs.⁴

In the FSM, the number of people participating in the labor force increased by 25% between 1994 and 2000. Wage-salary jobs, however, declined by 11% between FY 1995 and FY 2009. This has resulted in rapid growth in the subsistence sector as well as growth in the ranks of the unemployed. Youth, for example, are much more likely to be unemployed; one-in-three youth aged 15-24 years were unemployed in 2000.⁵

There are no data to track hunger in the FSM (Target 1-C). A relatively small proportion of the population (11%) lives below the food poverty line (FPL) suggesting that extreme poverty and poverty-caused hunger are not widespread.

¹ For example around the main islands, fish stocks have been depleted. Fishing in many locations now requires money for a motorboat and gas. Likewise, in agriculture, population pressures mean that fallow periods are shortened; rotating agriculture is not feasible in many locations. Hence for many farmers, agriculture today requires external inputs such as fertilizers and pesticides.

² The HIES are analyzed from the perspective of expenditures which include all goods and services produced at home for home consumption. Nationwide, 18% of average household income derives from home (subsistence) production.

³ As defined by the FSM census, a Female headed household “a family with a female householder and no spouse of householder present” (Census, 2000).

⁴ In this context, “poor” households refer to those in the lowest 30% of expenditures.

⁵ 2000 is the latest comprehensive labor force profile. An updated profile will be available in mid-2011 reflecting 2010 Census data.

MDG 2 (Education) has only one target – achieve universal primary education for all children everywhere. To this quantitative target, the FSM has added a qualitative dimension – all children to achieve competency in the core subjects taught in FSM schools.

The FSM has made steady progress in expanding school enrollment. Net primary enrollment for the 2007-2008 school year exceeded 96% with only sporadic evidence of gender bias.

High school participation levels have boosted literacy levels – now in excess of 95% for young adults aged 15-24 years. However, the FSM falls short of its own domestic target for quality of instruction and learning. Among 8th graders sitting the FSM National Exam during the 2008-2009 school year, only 40% tested at the level of competent (or higher) in reading and 37% tested as competent (or higher) in literature. Prior year standardized test found even worse results for math (16% competent) and natural science (6% competent).

MDG 3 (Gender) measures women's progress toward equality in the areas of education, employment and politics. The ratio of girls to boys at the various levels of schooling indicates that FSM women have generally achieved equality in education evidenced by ratios of girls to boys in:

- Primary school, 0.96;
- Secondary school, 1.02;
- College of Micronesia, 1.14.

The number of women in the labor force nearly doubled between 1994 and 2000 although most of the increase occurred in the subsistence (fisheries-agriculture) sector. The 2000 Census showed that for every two men working in a wage-salary job, there was only one woman. This supports the assertion made by women that despite anti-discrimination provisions in the National Constitution and the law, women face many obstacles to entering and advancing in the labor market. Moreover, Micronesia women have not yet achieved equal pay for equal work. On average for every \$1 earned by men, women earn \$0.87. The differential is evident in both public and private sectors.

The FSM Strategic Development Plan (SDP) notes that “persistent cultural and traditional values and practices hinder women's active participation in power and decision-making processes and structures.” Women, however, have not yet broken through barriers that keep them out of elected office. To-date, no woman has ever been elected to the FSM National Congress nor to legislatures in Kosrae and Yap. According to UNDP, FSM is one of only three countries worldwide with the dubious distinction of having never elected a woman into the national congress (UNDP, 2010). The slow progress in the political arena has resulted in a serious move to create reserve seats for women in the National Congress.

MDG 4 (Child Mortality) aims to reduce under 5 child mortality by two thirds. Immunization and breastfeeding indicators support this goal. While the FSM does not routinely tabulate or report on the Under-5 Child Mortality Statistic, it does tabulate and closely monitor infant mortality.⁶ To achieve the MDG goal for infant deaths will mean for the FSM reduction from 46 infant deaths (per 1000 livebirths) in 1990 to 15 infant deaths (per 1000 livebirths) in 2015.

The MDG indicator for immunization coverage is universal immunization against measles by 12 months of age, a level that FSM achieved in 2008 and 2009.⁷ FSM's own national indicator is ‘children fully immunized by 2 years of age’. In 2009, the full immunization rate nation-wide was 68% with only Kosrae achieving coverage in excess of 90%.

⁶ U5MR is defined as the number of deaths among children 0-4 years of age divided by the number of live births for the same time period. Infant mortality is defined as the number of deaths among children 0-364 days of age divided by the number of live births for the same time period.

⁷ Universal is widely interpreted as meaning immunization rates at or above 90%.

A still unofficial indicator in support of MDG 4 is continued breastfeeding at six months of age.⁸ FSM has adopted the WHO and UNICEF recommendation to promote exclusive breastfeeding until six months of age. Available data, however, measure only continued breastfeeding (not exclusive breastfeeding). While rates are high (73%, 2009), they fall short of universal and have actually declined since 2005.

MDG 5 (Maternal Health) addresses maternal deaths and access to reproductive health services. The global target is to reduce maternal mortality by three quarters which in the FSM translates into reducing the number of maternal deaths from an average of 6-7 deaths per year to no more than 1 death per year.

During the 11-year period (1999-2009), 42 maternal deaths were reported; the annual number ranged from zero (2008 and 2009) to 13 (2004). While Pohnpei and Chuuk reported moderate MMR (Maternal Mortality Ratio), the rates in Kosrae and Yap were extremely high. Despite a degree of uncertainty, by applying standard methods to extrapolate trends from the data, it appears that FSM is off-track with respect to maternal mortality reduction.⁹

A second target under MDG 5 is universal access to reproductive health services. This target has four indicators: contraceptive prevalence rate; adolescent fertility rate; antenatal care coverage; and unmet need for family planning services. Contraceptive prevalence has actually declined since 1990 (from 450 users per 1,000 women to 400 users in 2009). Total fertility rates continue to drop steadily. Teen fertility rates have also declined (from 55.8 to 42.5 births per 1,000 women 15-19 years of age).

While most births are preceded by at least one antenatal visit, only 60% achieve a score of 80% or higher on the Kotelchuk Index.¹⁰ Ninety percent of births take place in a health facility and 88% are attended by skilled health personnel. There are no measures for 'unmet need for contraceptive services' as data relating to this indicator are commonly obtained through reproductive health surveys that have not been undertaken in the FSM.

MDG 6 addresses HIV/AIDS, malaria, tuberculosis, and non-communicable diseases (NCDs) – for example, diabetes, hypertension, cerebrovascular diseases, cancer, and others.¹¹

With 37 cases reported since the beginning of the HIV-AIDS epidemic in 1989, FSM has a low prevalence of HIV/AIDS. As of December 2009, the cumulative prevalence rate was 34.6 cases per 100,000 population and the current prevalence rate (patients still living) was 8.3 cases per 100,000. Heterosexual contact is the predominant mode of transmission although MSM¹² and mother-to-child transmission is important as well. Second generation surveys conducted in Pohnpei, Yap and Chuuk suggest, however, that a significant number of people continue to place themselves at risk through unprotected sex with multiple partners.

Tuberculosis rates are high and appear to be increasing and NCDs are at epidemic levels in the FSM. Eight out of every 10 reported deaths are caused by a NCD (cancer, heart, disease, stroke, hypertension, or diabetes). An NCD survey that charts prevalence of disease and risk factors has been completed and published for Pohnpei (2002). Fifty-seven per cent of adults there (60% of men and 53% of women) have 3 or more risk factors for NCDs. The prevalence rate for hypertension is 21% and for diabetes is 32%.

⁸ Breastfeeding is not yet an official MDG indicator but it has been recommended for addition by the 2010 World Health Assembly.

⁹ Standard measures involve development of multi-year moving averages and using a logarithmic formula to project trends through to 2015.

¹⁰ A measure that takes into consideration the trimester in which antenatal care was initiated and risk-adjusted continuity of antenatal care.

¹¹ This goal also targets malaria which is not relevant in the FSM. The Anopheles mosquito that carries malaria is not found in the FSM so there is no local transmission of this disease. Any cases that occur are imported from areas where malaria is endemic.

¹² MSM refers to men who have sex with men.

MDG 7 has four targets: (7-A) integrate the principles of sustainable development into policies and programs and reverse the loss of environmental resources; (7-B) reduce biodiversity loss; (7-C) increase access to improved water supplies and sanitation facilities; and (7-D) improve the lives of slum dwellers.

Official indicators show that 89% of the land area on the main islands of the FSM is under forest cover. This figure, however, masks serious challenges caused by conversion of primary forests to agro-forestry with negative consequences for biodiversity.

FSM is extremely vulnerable to climate change and has taken aggressive action to control its own greenhouse gas emissions and will continue to do so by embracing a sub-regional “Green Energy Micronesia” initiative.¹³ Simultaneously, FSM has assumed leadership in the regional and global arenas to persuade developed countries to also contain their emissions. FSM has also virtually eliminated use of Ozone Depleting Substances (ODS) with the exception of a small quantity of HCFCs that are slated for immediate phase-out (Alik, 2010).¹⁴

The Western and Central Pacific Ocean, an area that includes the FSM exclusive economic zone, is home to the world’s best stocks of tuna. The annual harvest of skipjack and yellowfin tuna remains about Maximum Sustainable Yield (MSY). The sustainability of bigeye tuna is also of concern. The Western and Central Tuna Commission, the international body responsible for management of the area’s tuna stocks, has requested a 30% reduction in the catch of bigeye. As a member of the Commission, FSM is working closely with neighboring resource-owning nations to aggressively conserve tuna resources.

Inshore, depletion of marine resources is a widely acknowledged problem. The focal strategy is expansion and sustainable management of a nation-wide network of community-based marine protected areas. FSM has adopted the Micronesia Challenge¹⁵ which calls for all Micronesia entities to protect or otherwise sustainably manage at least 20% of terrestrial resources and 30% of inshore marine resources. As of 2010, FSM has 6% of near shore marine resources and 15% of terrestrial resources under protection.¹⁶

There is no definitive list of Micronesian endangered species. According to the National Biodiversity Strategic Action Plan (NBSAP), scientific research leading to a definitive inventory of species at risk should be a high priority for the nation.

FSM has made good progress toward the MDG target of universal access to improved drinking water. Access to improved water supplied nearly doubled between 1994 and 2005 (from 29% to 57% of households). The proportion of households with toilet facilities has also increased (from 44% to 73%) although the proportion of households using improved sanitation (public sewer or private septic system) has actually declined (from 27% to 25%).

The FSM Strategic Development Plan gives high priority to achieving universal access to improved safe water and improved sanitation with significant infrastructure development funding earmarked to the water and sanitation sector (Strategic Development Plan, Volume III).¹⁷

¹³ “Green Energy Micronesia” is an initiative of the Chief Executives of the Micronesian governments to reduce energy use through: increased efficiency (20%), increased conservation (20%) and expansion of renewable energy (30%).

¹⁴ HCFCs were introduced originally as a safe alternate to CFCs but later found to contribute to climate change. Work is in progress to phase-out use of HCFCs in cooperation with SPREP.

¹⁵ The Micronesia Challenge is an agreement by the Chief Executives of the Micronesian political jurisdictions (FSM, Marshalls, Palau, Guam, and Commonwealth of the Northern Mariana Islands) to protect 20% of terrestrial resources and 30% of near-shore marine resources. The Challenge is a major force behind the FSM’s drive to develop a nationwide network of protected areas encompassing all of the ecosystems and species found in across the country.

¹⁶ This includes central islands only and not community-based management schemes operating in outer islands. Tabulation of these areas is work in progress.

¹⁷ Under the Compact of Free Association (COFA) between the FSM and the United States, approximately 20% of infrastructure development grants are allocated to the water and sanitation sector.

Forging global partnerships in support of the MDGs is the focus of 4 of the 6 targets under **MDG 8**. Three forms of global partnership are specifically highlighted: official development assistance (ODA); market access; and debt relief. The two additional targets are: access to pharmaceuticals and information technologies.

FSM depends heavily on ODA to finance recurrent government expenditures and capital investment. In FY 2007, official figures show FSM received US\$ 92 million in ODA – 73% from the United States through the Compact of Free Association (COFA).

Increasing the inflow of foreign direct investment (FDI) is a high priority of the SDP although results to date in attracting higher levels of FDI are disappointing. Stimulating higher levels of trade is another high plan priority. At present the FSM balance of trade is strongly negative (FY 2008, -\$153 million).¹⁸

In the 1990s, the FSM accumulated significant external debt that ultimately reached a level that threatened financial stability. By FY 2001, using COFA revenues, government was able to clear the backlog of debt and has subsequently limited borrowing to concessional loans. Today the FSM external debt is about 28% of GDP and debt service is around 3% of exports.

The indicator “access to affordable drugs” cannot be measured in the FSM.¹⁹ Shortages of drugs due to a combination of fiscal, management, and supply issues pose a well-recognized constraint to delivery of quality health services in health centers and in hospitals. The FSM has established partnerships for drugs with several external agencies – UNFPA for contraceptives; UNICEF and WHO for vaccines; U.S. Centers for Disease Control for certain drugs needed to treat communicable diseases. However, the country has not established direct partnerships with the pharmaceutical industry.

The target that addresses access to information technologies has steadily expanded in the FSM although still constrained by high costs and lack of electric power in many locations. In April 2010, a fiber optic cable linking Pohnpei to the rest of the world became operational. While expensive, this facility greatly improves the quality and speed of external communications and hence, enhances Pohnpei’s environment for business. The national government is currently working to identify external partners to help extend fiber optic capabilities to the other three states.

4. Conclusion

Available data suggest that FSM is off-track for achieving **MDG 1**. The actual number of households and persons living below the poverty line (basic needs) increased between 1998 and 2005. However, the trend is toward greater inter-household equality due to remittances (which might have flowed mostly toward low income households) and to public sector retrenchments (reduction in force compensation or hours and early retirement) that have the effect of reducing income/expenditures of higher earning households as opposed to measures that increase income/expenditures by lower earning.

FSM is on track to achieve **MDG 2** with high primary school enrollment levels, although quality of education is cause for concern.

FSM women have achieved equality in the education arena and are making slow but steady progress in the employment arena. Representation in political office remains extremely low. FSM is therefore off-track to achieving **MDG 3** by 2015 although further progress is expected especially if the proposed measure to create reserve seats for women in Congress wins approval.

¹⁸ Balance of trade is defined as exports (goods and services) minus imports (goods and services).

¹⁹ The relevant indicator is “proportion of the population will access to 20 or more of the most essential drugs.”

Based on civil registration of births and deaths, FSM is slightly off-target for achieving **MDG 4**. By carefully targeting interventions to address causes of death, especially in Yap and Chuuk, FSM should be able to achieve MDG 4 by 2015.

Overall FSM is off track with respect to the mortality reduction target of **MDG 5**. It is also slightly off-track to achieve the reproductive health target. With aggressive action, there is adequate time between now and 2015 to redress this situation by strengthening primary health care services – not only for women and children but for the entire population.

Although the prevalence of HIV-AIDS is relatively low, a large number of people continue to practice risky sexual behaviors and knowledge about prevention and transmission is poor, especially among youth. Tuberculosis rates are high but DOTs (Directly Observed Treatment, Short-course) is being implemented nation-wide despite some challenges to applying DOTs consistently in areas with wide population dispersion. NCD prevalence is high; addressing the risk factors that trigger NCDs will take time. The FSM is slightly off-track to achieving **MDG 6** but time remains between now and 2015 to get “on track” with all but the NCD target.

Overall FSM is generally on-track with respect to **MDG 7**. It is currently off-track to achieve the water and sanitation target; however prospects for achieving at least the water portion of the target by 2015 are favorable.

MDG 8 is generally on-track in the FSM. All of the MDG sectors, especially health and education, benefit significantly from ODA funding. The ability of the FSM to continue progress toward the MDGs will largely depend on the continued inflow of ODA resources.

Although increasing the inflow of FDI is a priority results in attracting more FDI flows are unsatisfactory, a situation exacerbated by the global macroeconomic conditions. Microeconomic factors have also posed serious constraints to attract more flows to the country due to the current “not friendly” regulatory framework in place regarding foreign investment.

The full text of the MDG report presents extensive information about the status of the FSM *vis-à-vis* the MDGs as of 2010 (see summary in the table following).²⁰

MDG Status at a Glance		
MDG	Current Status	Ability to achieve by 2015
Poverty	Off-track	Less challenging local goal achievable
Education	On-track	Care needed to prevent regression
Gender	Education achieved	Education achieved
	Economy off-track	Economy – progress expected
	Politics off-track	Politics – progress uncertain
Infant and child health	Slightly off-track	Achievable
Maternal health	Off-track but data weak	Achievable
HIV-AIDS and other diseases	Generally on-track	HIV & TB achievable; can progress toward localized NCD goal
Environment	On Track	Achievable
Global partnerships	Generally on track	Achievable

²⁰ This table is not intended as a “stand alone” table. Rather, it should be reviewed in conjunction with the full MDG report which documents the evidence that supports the status summary.

MDG 2 has been virtually achieved. MDGs 6, 7, and 8 are well “on track” for 2015. MDGs 4 and 5 are currently “off-track” but with carefully targeted interventions are achievable. MDG 3 has been partially achieved (participation of girls in school). While further progress is expected by 2015 with respect to economic and political targets, FSM will not achieve full gender equality by 2015. FSM is seriously “off-track” with respect to MDG 1 (poverty and employment) and localization with revised targets that are ambitious but feasible is recommended.

5. Recommendations

The full-text of the MDG report contains a number of recommendations for accelerating progress toward 2015. These include:

1. Expand “ownership” of the MDGs beyond the national government to include state governments and civil society.
2. Further localize the MDGs to include selected topics of high national or state priority and for those targets that cannot be achieved by 2015, create less challenging local targets that are achievable. This is particularly recommended for MDG 1.
3. Strengthen communications about MDGs in order to raise their profile across the nation.
4. MDGs 2-7 require implementation action primarily at state levels. MDG 1, however, will benefit from national level action. It is recommended that the National MDG Task Force assume leadership to address the poverty and hardship component of MDG 1 (Target 1-A).

Despite a number of red cells on the table alongside (indicating goals for which the FSM is off-track), the prognosis through to 2015 is positive. Progress will depend on the strength of national leadership – within the MDG Task Force and at the highest levels of government – to build the base that supports accelerated action.

Complete List of Millennium Development Goals, Targets, and Indicators

Goals and Targets	Indicators
Goal 1: Eradicate extreme poverty and hunger	
Target 1.A. Halve, between 1990 and 2015, the proportion of people whose income is less than US\$ 1-a-day.	1.1 Proportion of population below \$1 (PPP) per day. 1.2 Poverty gap ratio. 1.3 Share of poorest quintile in national consumption.
Target 1.B. Achieve full and productive employment and decent work for all, including women and young people.	1.4 Growth rate of GDP per person employed. 1.5 Employment-to-population ratio. 1.6 Proportion of employed people living below \$ 1 (PPP) per day. 1.7 Proportion of own-account and contributing family workers in total employment.
Target 1.C. Halve, between 1990 and 2015, the proportion of people who suffer from hunger.	1.8 Prevalence of underweight children under-five years of age. 1.9 Proportion of population below minimum level of dietary energy consumption.
Goal 2: Achieve universal primary education	
Target 2. Ensure that by 2015 children everywhere, boys and girls alike, will be able to complete full course of primary schooling.	2.1. Net enrolment ratio in primary education. 2.2. Proportion of pupils starting on Grade 1 who reach Grade 5. 2.3. Literacy rate of 15-24 years old, women and men.
Goal 3: Promoted gender equality and empower women	
Target 3. Eliminate gender disparity in primary and secondary education, preferably by 2005 and to all levels of education no later than 2015.	3.1. Ratio of girls and boys in primary, secondary and tertiary education. 3.2. Share of women in wage employment in the non-agricultural sector. 3.3. Proportion of seats held by women in national parliament.
Goal 4: Reduce child mortality	
Target 4. Reduce by two-thirds, between 1990 and 2015, the under-five mortality rate.	4.1. Under-five mortality rate. 4.2. Infant mortality rate. 4.3. Proportion of 1 year-old children immunized against measles.
Goal 5: Improve maternal health	
Target 5.A. Reduce by three quarters, between 1990 and 2015, the maternal mortality ratio.	5.1. Maternal mortality ratio. 5.2. Proportion of births attended by skilled health personnel.
Target 5.B. Achieve, by 2015, universe access to reproductive health.	5.3. Contraceptive prevalence rate. 5.4. Adolescent birth rate. 5.5. Antenatal care coverage (at least one visit and at least four visits). 5.6. Unmet need for family planning.

Goal 6: Combat HIV/AIDS, malaria and other non-communicable diseases (diabetes, cancer, etc.)

Target 6.A. Halve halted by 2015 and begun to reverse the spread of HIV/AIDS.	6.1. HIV prevalence among population aged 15-24 years. 6.2. Condom use at last high-risk sex. 6.3. Proportion of population aged 15-24 years with comprehensive correct knowledge of HIV/AIDS. 6.4. Ratio of school attendance of orphans to school attendance of non-orphans aged 10-14 years.
Target 6.B. Achieve, by 2010, universal access to treatment for HIV/AIDS for all those who need it.	6.5. Proportion of population with advanced HIV infection with access to antiretroviral drugs.
Target 6.C. Have halted by 2015 and begun to reverse the incidence of malaria and other major diseases.	6.6. Incidence and death rates associated with malaria. 6.7. Proportion of children under 5 sleeping under insecticide-treated bednets. 6.8. Proportion of children under 5 with fever who are treated with appropriate anti-malarial drugs. 6.9. Incidence, prevalence and death rates associated with tuberculosis. 6.10. Proportion of tuberculosis cases detected and cured under directly observed treatment short course.

Goal 7: Ensure environmental sustainability

Target 7.A. Integrate the principles of sustainable development into country policies and programs and reverse the loss of environmental resources.	7.1 Proportion of land area covered by forest. 7.2 CO2 emissions, total, per capita and per \$1 GDP (PPP). 7.3 Consumption of ozone-depleting substances. 7.4 Proportion of fish stocks within safe biological limits. 7.5 Proportion of total water resources used.
Target 7 B. Reduce biodiversity loss, achieving, by 2010, a significant reduction in the rate of loss.	7.6 Proportion of terrestrial and marine areas protected. 7.7 Proportion of species threatened with extinction.
Target 7.C. Halve, by 2015, the proportion of people without sustainable access to safe drinking water and basic sanitation.	7.8 Proportion of population using an improved drinking water source. 7.9 Proportion of population using an improved sanitation facility.
Target 7.D. By 2020, to have achieved a significant improvement in the lives of at least 100 million slum dwellers.	7.10 Proportion of urban population living in slums.

Goal 8: Develop a global partnership for development

Target 8.A. Develop further an open, rule-based, predictable, non-discriminatory trading and financial system.	Official Development Assistance (ODA) 8.1. Net ODA, total and to the least developed countries (LDCs), as percentage of OECD/DAC donors' gross national income. 8.2. Proportion of total bilateral, sector-allocable ODA or OECD/DAC donors to basic social services (basic education, primary health care, nutrition, safe water and sanitation). 8.3. Proportion of bilateral official development assistance of OECD/DAC donors that is untied. 8.4. ODA received in landlocked developing countries as a proportion of their gross national incomes. 8.5. ODA received in small island developing states as a proportion of their gross national incomes.
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<p>Target 8.B. Address the special needs of the least developed countries. This includes tariffs and quota free access for the least developed countries' (LDCs) exports; enhanced programs of debt relief for heavily indebted countries (HIPC); and cancellation of official bilateral debt and more generous ODA for countries committed to poverty reduction.</p> <p>Target 8.C. Address the special needs of landlocked developing countries and small island development States (through the Program of Action for the Sustainable Development of Small Island Developing State and the outcome of the 22nd Special Session of the General Assembly).</p>	<p>Market access</p> <p>8.6. Proportion of total developed country imports (by value and excluding arms) from developing countries and LDCs, admitted free of duty.</p> <p>8.7. Average tariffs imposed by developed countries on agricultural products, textiles, and clothing from developing countries.</p> <p>8.8. Agricultural support estimate of OECD countries as a percent of their gross domestic product.</p> <p>8.9. Proportion of ODA provided to help build trade capacity.</p>
<p>Target 8.D. Deal comprehensively with the debt problems of developing countries through national and international measures in order to make debt sustainable in the long term.</p>	<p>Debt sustainability</p> <p>8.10. Total number of countries that have reached their HIPC decision points and number that have reached their HIPC completion points (cumulative).</p> <p>8.11. Debt relief committed under HIPC and MDRI Initiatives.</p> <p>8.12. Debt service as a percentage of exports of goods and services.</p>
<p>Target 8.E. In cooperation with pharmaceutical companies, provide access to affordable essential drugs in developing countries.</p>	<p>Pharmaceuticals</p> <p>8.13. Proportion of population with access to affordable essential drugs on a sustainable basis.</p>
<p>Target 8.F. In cooperation with the private sector, make available the benefits of new technologies, especially information and communications.</p>	<p>Communications</p> <p>8.14. Telephone lines per 100 population.</p> <p>8.15. Cellular subscribers per 100 population.</p> <p>8.16. Internet users per 100 population.</p>

The background of the page is a vibrant green color with a complex, abstract pattern of overlapping, irregular geometric shapes. These shapes, in various shades of green, create a textured, layered effect that resembles a map or a stylized landscape. The overall aesthetic is modern and dynamic.

Section 1. Introduction

- Section 1.1. Introduction to the Millennium Declaration and Goals
- Section 1.2. FSM Development Context

Section 1.1.

Introduction to the Millennium Declaration and Goals

Declaration and Goals. Building on a decade of major United Nations conferences and summits, world leaders came together in September 2000 to adopt the [United Nations Millennium Declaration](#). In doing so, they committed their nations to a new global partnership to reduce extreme poverty and laid out a series of time-bound targets - with a deadline of 2015 - that have become known as the Millennium Development Goals or MDGs.

“Eradicating extreme poverty continues to be one of the main challenges of our time, and is a major concern of the international community. Ending this scourge will require the combined efforts of all, governments, civil society organizations, and the private sector, in the context of a stronger and more effective global partnership for development. The Millennium Development Goals set time-bound targets, by which progress in reducing income poverty, hunger, disease, lack of adequate shelter and exclusion — while promoting gender equality, health, education and environmental sustainability — can be measured. They also embody basic human rights — the rights of each person on the planet to health, education, shelter and security. The Goals are ambitious but feasible and, together with the comprehensive United Nations development agenda, set the course for the world’s efforts to alleviate extreme poverty by 2015.” *United Nations Secretary-General BAN Ki-moon.*

Millennium Development Goals	
The eight Millennium Development Goals are supported by 18 targets and 60 indicators (United Nations, 2008). The goals:	
	Eradicate extreme poverty and hunger
	Achieve universal primary education
	Promote gender equality and empower women
	Reduce child mortality
	Improve maternal health
	Combat HIV/AIDS, malaria, and other diseases
	Ensure environmental sustainability
	Develop a global partnership for development

The FSM, together with 188 other nations, participated in the Millennium Development Conference and signed the Millennium Declaration. As a signatory, the FSM is obligated to report periodically on progress toward the goals.









Reporting Process. The work of preparing a baseline report on the status of the MDGs in the Federated States of Micronesia and galvanizing action at national, state, and community levels toward implementation has taken place over three phases. The first phase, starting in 2004, began with creation of a National MDG Taskforce by Presidential Executive Order. The Task Force is currently comprised of technical staff from National Government agencies including: Department of Health and Social Affairs; Department of Education; the Office of SBOC; Department of Foreign Affairs; Department of Resources and Development; Department of Justice; Department of Transportation, Communication and Infrastructure; Office of Environment and Emergency Management; Office of National Archives and Cultural Preservation. One of the first actions of the Task Force was to conduct an inventory of data pertinent to the indicators. In 2004, it was determined that 50 out of 60 international indicators were applicable to the FSM with data available to assess 40 indicators.

Subsequently, it has been possible to assess 44 indicators directly and to use proxy data to assess an additional two. Only 4 indicators cannot be assessed for the purpose of this status report. It must be noted, however, that not all indicators are complete (e.g. complete time series or data available from all states), some key data are old, and the quality of some of the data is less than adequate.

The second phase of activities focused on building support for the MDGs on the part of the national leadership while the third phase focused on building support among state leaders and civil society.²¹ In practice, all three phases are intertwined and have been pursued simultaneously. National and state MDG workshops were held in 2009 with the dual purposes of identifying and verifying data needed for this status report while building awareness and support for the MDGs on the part of government and civil society. This status report represents the culmination of nearly six years of work and the inputs of countless people at every level of society.

This document represents the FSM's first comprehensive report on the MDGs. It is designed to raise awareness about the MDGs at home while informing the global community about progress since 1990 (or alternate base year depending on data availability). The status of the MDGs in the FSM was officially unveiled in September 2010 when the nations of the world came together once more at the United Nations to review progress toward the MDGs on the occasion of the 10th anniversary of the Millennium Declaration.

The report is divided into four sections. Section 1, (Introduction), contains an overview of the MDGs and the FSM's development context. Section 2, (MDGs and the Nation), summarizes the national situation vis-à-vis each of the eight goals. Section 3, (MDGs and the States), provides a thumbnail sketch of the status of the MDGs in each of the FSM's four states. Section 4 (2015 and Beyond) suggests actions that could accelerate progress toward the MDGs in the five years remaining before the 2015 target date. Table 1.1-1 below summarizes the status of the MDGs according to the current status and the level of support across the nation for the target.

Table 1.1-1. FSM Status vis-à-vis the MDGs at a Glance			
Likelihood of Achieving		Status of National Support*	
	Goal achieved or soon to be achieved		Strong support for the goal/target
	Progress being made; on track for 2015		Fair support for the goal/target
	Off-track to achieve by 2015		Support weak but improving
	Inadequate data to assess progress		Support weak
Target	Likelihood of Achieving	Status of Support	
MDG 1. Eradicate extreme poverty and hunger			
1.A. Halve the proportion of the population living on less than US\$1/person/day expressed in purchasing power parity.	Cannot be calculated	Cannot be calculated	
1A. Halve the proportion of people living below the national food poverty line (proxy measure).	Off-track	Fair Support	
1B. Achieve full and productive employment for all including women and young people.	Off-track	Strong Support	
1C. Halve the proportion of people suffering from hunger.	Insufficient data	Strong Support	
MDG 2. Achieve universal primary education			
2A. Ensure that, by 2015, children everywhere, boys and girls alike, will be able to complete a full course of primary schooling.	Universal participation	On track but vulnerable	Strong support
	Quality of learning	Off-track	Strong support
MDG 3. Promote gender equality and empower women			
3A. Eliminate gender disparity in primary and secondary education, preferably by 2005, and in all levels of education no later than 2015.	Education	Achieved	Strong support
	Labor Force	Off-track	Fair support
	Politics	Off-track	Fair support

²¹ The term "civil society" includes registered NGOs and also community-based organizations, traditional leaders, churches, and other institutions recognized within the community.

MDG 4. Reduce child mortality		
4A. Between 1990 and 2015, reduce the under-five child mortality by two-thirds.**	Slightly off-track	Strong support
MDG 5. Improve maternal health		
5A. Between 1990 and 2015, reduce the maternal mortality ratio by three-quarters (75%).**	Off-track but data weak	Strong support
5B. By 2015, achieve universal access to reproductive health care services.	On-track	Strong support
MDG 6. Combat HIV/AIDS, malaria, tuberculosis, and other diseases		
6A. By 2015 have halted and begun to reverse the spread of HIV/AIDS.	On-track	Strong support
6B. By 2010 achieve universal access to treatment for HIV/AIDS for all who need it.	Achieved	Strong support
6C1. By 2015 have halted and begun to reverse the spread of malaria.	Not Applicable to the FSM	
6C2. By 2015 have halted and begun to reverse the spread of tuberculosis	Off-track but achievable	Strong support
6C3. By 2015 to have halted and begun to reverse the prevalence of non-communicable diseases.	Off-track	Strong support
MDG 7. Ensure environmental sustainability		
7A. Integrate the principles of sustainable development into country policies and programs and reverse the loss of environmental resources.	On track	Strong support
7B. Reduce biodiversity loss, achieving, by 2010, a significant reduction in the rate of loss.	On track	Strong support
7C. Halve, by 2015, the proportion of people without sustainable access to safe drinking water and basic sanitation.	Water achieved	Strong support
	Sanitation - Off-track	
7D. By 2020, to have achieved a significant improvement in the lives of at least 100 million slum dwellers.	Not Applicable to the FSM	
MDG 8. Forge global partnerships for development		
8A. Develop further an open, rule-based, predictable, non-discriminatory trading and financial system.	On track	Strong support
8B. Address the special needs of least developed countries.	Not applicable to the FSM.	
8C. Address the special needs of small island developing States (Barbados & Mauritius Programs of Action).	On track	Strong support
8D. Deal comprehensively with the debt problems of developing countries through national and international measures in order to make debt sustainable in the long term.	Achieved	Strong support
8E. In cooperation with pharmaceutical companies, provide access to affordable essential drugs in developing countries.	Off track	Strong support
8F. In cooperation with the private sector, make available the benefits of new technologies, especially information and communications.	On track	Strong support
* Note: Level of national support reflects statements in the National Strategic Development Plan and supporting sector-specific plans as well as budget allocations.		
** Note: The rating of the two mortality goals (child mortality and maternal mortality) as "slightly off track" is based on civil registration of births and deaths. The 2010 population census is now underway; data relating to fertility and mortality will be available by mid-2011. At that time, it will be possible to compare fertility and mortality rates based for four years prior to the census dates (e.g. compare 1994 and 2006 vital statistics in order to definitively report on progress toward the mortality targets).		

Section 1.2.

FSM Development Context

Introduction. The Federated States of Micronesia (FSM) is the largest and most diverse part of the Micronesian sub-region of the vast Pacific region. It is comprised of 607 islands lying in an arc along the equator between 1° south and 14° north latitude, and between 135° and 166° east longitude. FSM's total landmass is 438 square miles (702 km²) spread across an Exclusive Economic Zone of 1,161,578 square miles (1.6 million km²). Its elevation ranges from sea level to about 2,500 feet (760m). Its marine and terrestrial biodiversity are the nation's living wealth with high levels of species endemism especially among the terrestrial biota. This high endemism is due to the isolation of the islands from one another and from other landmasses in the greater Micronesian region.

Based on provisional census data, the 2010 population was 102,624, a drop of 5,215 persons (4%) since 2000 (SBOC, 2010 and FSM Statistical Yearbook 2008, Table 2.10). This decline in population primarily reflects high levels of outmigration rather than low birth rates.

The FSM is a federation of four semi-autonomous island States in geographic sequence from east to west – Kosrae, Pohnpei, Chuuk, and Yap.

- Kosrae is the eastern-most state and the smallest in terms of both area and population. It is comprised of only a single island with a very small lagoon and is geographically remote from the rest of the country.
- One-third of the population lives in Pohnpei, most on Pohnpei Island which is the largest land mass in the FSM (132 square miles). The state has five outlying island groups all of which are atolls. The population includes Micronesians (on the main island and three of the five outlying islands) and two groups of Polynesians in the outer islands of Nukuoro and Kapingamarangi. The capital of the FSM is located at Palikir on Pohnpei Island. Because of an influx of islanders from the other states to work in the national government, Pohnpei is the most cosmopolitan of the FSM's states.
- Half the FSM population lives in Chuuk, most in Chuuk lagoon which is comprised of three large island groups: the Northern Namoneas; the Southern Namoneas; and Faichuck. Six other atoll island groups are located at considerable distance from Chuuk Lagoon. With a high population density, Chuuk faces pressure on its natural resources together with the challenges of rapid urbanization, social change, and high levels of unemployment.
- Ten percent of the population lives in Yap, the western-most state which includes 12 island complexes populated by two distinct cultural groups - Carolineans from the outlying atolls and Yapese from the main island. Yap is the only state of the FSM that experienced population growth between 2000 and 2010. It is the most traditional of the four states. Custom and tradition remains very strong and much of the population continues to practice a semi-subsistence lifestyle.

Table 1.2-1. Overview of the States Comprising the FSM

State	# island groups	# islets	Topography	Land Area (sq. miles)	Population 2000	Population 2010	Av. Annual Population Change 2000-2010	Population Density 2010 (persons/sq mile)
Kosrae	1	1	High volcanic	42.3	7,696	6,616	-1.50	156
Pohnpei	6	26	High volcanic & atoll	132	34,486	35,981	+0.42	273
Chuuk	7	542	High volcanic & atoll	49	53,595	48,651	-0.97	993
Yap	12	139	High volcanic & atoll	46	11,241	11,376	0.12	247

Sources: FSM Statistical Yearbook 2008; 2000 Census of Population and Housing, Volume II; Provisional Census Tables, 2010 (SBOC).

The temperature in the FSM averages 80 degrees (Fahrenheit) with little seasonal variation. Rainfall is variable with Kosrae and Pohnpei receiving heavy rains. Average rainfall in Kosrae (1998-2007) was 188 inches per annum. Average rainfall in Pohnpei over the same period was 171 inches per annum but is as high as 300 inches per annum in the mountainous interior. In contrast, average rainfall in Yap was much lower at 131 inches (FSM Statistical Yearbook 2008). The FSM is subject to periodic tropical storms and typhoons that can cause widespread damage.

History. The islands now comprising the FSM were peopled an estimated 3,000 years ago by hardy explorers, probably originating in the Indo-Malay peninsula, who set out on voyages of discovery aboard small sailing vessels. Isolated from one another and from continental land masses, the people developed complex social structures with substantial variation between the various island groups. During the early 16th century, Spanish and Portuguese sailors happened upon the islands. They established a number of small trading outposts and Catholic missions. In 1886, in an effort to protect Spanish interests from encroachment by other European nations, Spain declared a protectorate over the islands. In 1899, following the Spanish-American war, Spanish interests were acquired by Germany who embarked on the first serious effort to colonize the islands and stimulate economic development based largely on the copra trade. Following World War I, German interests passed to Japan who intensified efforts to colonize the islands and bring them permanently into the Japanese colonial empire. Following Japan's loss in World War II, what is now the FSM, together with the Marshall Islands, Palau, and the Northern Mariana Islands, were united under the flag of the United Nations Trust Territory of the Pacific Islands (TTPI) administered by the United States. The U.S. administration oversaw a massive buildup of health and education infrastructure and initiated work to create a sustainable economic base preparatory to self-government and eventual independence.

Independence. In 1986, the FSM became an independent nation albeit with continuing close political and financial ties to the United States governed by a fifteen-year Compact of Free Association (COFA). For the 15-year period that comprised COFA I (1987 to 2001 extended subsequently to 2003), annual funding was provided to underwrite government operations and capital development at levels that decreased every 5 years. In total, the FSM received about \$2.3 billion in compact financial assistance during COFA I exclusive of funding under categorical grants awarded directly by U.S. line departments (United States GAO, 2008).²²

COFA I had three main goals: (1) secure self-government; (2) ensure certain national security rights for both parties, and (3) advance economic development leading to self-sufficiency. The first two goals were met while the third remains work in progress.

In 2003, the United States and FSM reached agreement on a second compact package (COFA II) that came into effect on June 25, 2004. COFA II continues direct U.S. financial assistance to the FSM but in place of budgetary support, funding is earmarked for only six priority sectors: health, education, environment, private sector development, public sector development, and infrastructure development with priority given to health and education. The value of assistance decreases most years with the amount of the decrement deposited in a trust fund account that will help sustain government operations at the end of COFA II in 2023. Table 1.2-2 shows the projected disbursements under COFA II. These sums exclude a Supplemental Education Grant and certain other categorical grants that FSM continues to receive directly from U.S. line departments. In total, the value of COFA II is estimated at 1.5 billion (United States GAO, 2008).

Governance. The FSM has four levels of governance - national, state, municipal, and traditional. The national government, headquartered at Palikir on Pohnpei Island has three branches. The legislative power of the national government is vested in the Congress of the Federated States of Micronesia. The Congress is comprised of four members (one from each state) elected for four-year terms and ten members (allocated to the states based on population) elected for two-year terms. The Executive power is vested in the President and Vice-President elected by the Congress from amongst members serving four-year terms. Judicial power is vested in the FSM Supreme Court headed by a Chief Justice assisted by up to five Associates Justices.

²² Although eligible under the terms of COFA I for categorical grants from several sources, the bulk of grant financing flowed through the U.S. Department of Health and Human Service and Department of Education in support of health and education services.

Within the federation, states retain considerable authority. The FSM Constitution specifies the powers of the FSM National Congress and expressly delegates all powers not designated to Congress to the states. Many government services and functions most closely associated with the MDGs (e.g. health, education, environmental protection, water and sanitation) are either concurrent national-state functions or primarily state functions. All of the state governments have three branches except for Yap which has four branches (inclusive of traditional government). Beneath the state governments comes another layer of municipal governments. Concurrent with the “western” system of governance, each state also retains and recognizes the power and authority of traditional government according to the custom and tradition of the state. In general traditional governance extends only to matters of custom and tradition but this is broadly defined to include land rights (and marine rights where lagoons are privately owned) and management of natural resources.

Table 1.2-2. Projected COFA II Funding, 2004-2003
(USD in millions)

Fiscal year	Grants (Section 211)	Trust fund contribution Section 215)		Fiscal year	Grants (Section 211)	Trust fund contribution (Section 215)
2004	\$76.2	\$16.0		2014	69.8	22.4
2005	76.2	16.0		2015	69.0	23.2
2006	76.2	16.0		2016	68.2	24.0
2007	75.4	16.8		2017	67.4	24.8
2008	74.6	17.6		2018	66.6	25.6
2009	73.8	18.4		2019	65.8	26.4
2010	73.0	19.2		2020	65.0	27.2
2011	72.2	20.0		2021	64.2	28.0
2012	71.4	20.8		2022	63.4	28.8
2013	70.6	21.6		2023	62.6	29.6

Source: GAO (2007). *Compacts of Free Association: Both FSM and the Marshalls face challenges in planning for sustainability, measuring progress, and ensuring accountability.* GAO Report No. 07-613.

National Sustainable Development. In 2003 the FSM completed a 20-year strategic development plan, an output of the 3rd FSM Economic Summit that reflected the inputs of over 400 participants representing a broad range of perspectives including government, traditional leaders, industry, and civil society. The “sustained growth” strategy encapsulated in the plan focuses on:

- Macro-economic stability;
- Good governance;
- Outward-oriented, private sector-led economy;
- Human resource developed (improved health and education services);
- Investment in infrastructure;
- Long-term environmental sustainability.

The SDP and the MDGs. The MDGs are not specifically mentioned in the National Strategic Development Plan (SDP) but the intent behind the MDGs is integrated throughout the document. Table 1.2-3 provides a brief overview of the linkages between the MDGs and the SDP.

Table 1.2-3. MDGs and the FSM Strategic Development Plan (SDP) - An Overview

MDG	Key Targets	FSM Strategic Development Plan
MDG 1 - Poverty	Reduce poverty by one-half	Expand export-oriented, private-sector led economic development; accelerate agriculture development; enhance food security; reduce dependency on imported foods.
	Achieve full and productive employment for all	
	Reduce malnutrition and hunger by one-half	Strengthen nutrition education and programming with priority on: breastfeeding promotion; improving child nutrition; reducing rates of Vitamin A deficiency; reducing rates of overweight/obesity.
MDG 2 - Education	Achieve universal participation in primary education	Improve quality of education at all levels; expand participation in secondary education; expand opportunities for vocational training and post-secondary education.
MDG 3 - Gender	Empower women	Empower women; maximize women's contributions by removing obstacles to their full participation in economic, social, and political life. (Note that the gender chapter is detailed with very specific targets that include violence against women, sexual harassment, maternity benefits, etc.)
MDG 4 - Child Deaths	Reduce child mortality by two-thirds	Reduce IMR by 50% by 2010; strengthen primary health care services including pediatric services.
MDG 5 - Maternal Health	Reduce maternal mortality by three-fourths	Strengthen primary health care services including reproductive health services.
MDG 6 - Health (general)	Combat HIV-AIDS, tuberculosis, and NCDs	Strengthen primary health care services; prioritize health services targeting major health problems with specific priority to reducing and better managing NCDs.
MDG 7 - Environment	Integrate sustainable development policies in national development plans and policies	Integrate environmental stewardship and sustainable practices in development programs; maintain forest cover at 2004 levels; reduce non-renewable energy use and hasten conversion to renewable energy sources in order to reduce greenhouse gas emissions.
	Reverse biodiversity loss	Strengthen natural resource management; expand protected area network; take action to ensure that no plant or animal in the FSM will go extinct.
	Halve proportion of people without access to improved water supplies and sanitation	100% of households will have access to adequate supplies of safe drinking water; 50% of households will have access to effective sewerage systems; 100% of urban and 50% of rural households will have sanitary latrines by 2010.
MDG 8 - Partnerships	Develop further an open, rule-based, predictable, non-discriminatory trading and financial system	Use ODA selectively to help create export-oriented private-sector led economic development; strengthen trade and tax policies to enhance international competitiveness of FSM products and services.
	Address the special needs of small island developing states	Cross-cutting throughout the plan.
	Deal comprehensively with the debt problems of developing countries	Manage external debt at prudent levels.
	Ensure access to affordable essential drugs	Ensure that all dispensaries have in-stock essential drugs at least 11 months or more of the year.
	Make widely available the benefits of new technologies in information and communications	Strengthen communications sector; extend fiber optic cable to all four states (<i>new national target not mentioned specifically in SDP</i>).



Section 2. MDGs and the Nation

Section 2.1 MDG 1 - Poverty and Hunger

Section 2.2 MDG 2 - Education

Section 2.3 MDG 3 - Gender

Section 2.4 MDG 4 - Child Mortality

Section 2.5 MDG 5 - Maternal Health

Section 2.6 MDG 6 - HIV and AIDS, Malaria, and
Other Diseases

Section 2.7 MDG 7 - Environmental Sustainability

Section 2.8 MDG 8 - Partnership for Development



Photo courtesy of Dr. Danko Taborosi

Millennium Development Goal 1 : Eradicate Poverty, Hardship, and Hunger

Table 2.1-1. FSM National Indicators at a Glance - MDG 1 Poverty

Indicator	Base Data		Most Recent		FSM Target	Data Source
	Year	Value	Year	Value		
Global Target 1-A. Between 1990 and 2015, halve the proportion of the population living on less than one dollar per day (expressed in purchasing power parity or PPP).						
Target 1-A (FSM Revision). Between 1990 and 2015, reduce the proportion of households living below the food poverty line (measure for absolute poverty) from 11.2% to 6.6% and below the basic needs poverty line (measure for relative poverty) from 28% to 14%.						
Population (%) with expenditures below US\$1/person/day (PPP)	NAv	NAv	NAv	NAv	NAv	NAv
Persons (%) below basic needs poverty line (1998 head count; 2005 adult equivalent)	1998	27.9%	2005	29.9%	14%	HIES, 1998 & 2005; Abbott, 2004 & 2008
Households (%) below basic needs poverty line (head count method)	1998	27.9%	2005	31.4%	14%	
Households below food poverty line (head count method)	1998	11.2%	2005	13.1%	6.6%	
Households (%) vulnerable to poverty (expenditures < 10% above BNPL)	1998	NAv	2005	4.8%	None	
Poverty gap ratio (depth of poverty)	1998	9.8	2005	9.3	None	
Squared poverty gap ratio (severity of poverty)	1998	4.8	2005	4.0	None	
Expenditure share of poorest quintile (20%) of households	1998	NAv	2005	8.5%	None	
Ratio of expenditures of lowest quintile households to the highest quintile households (Q1:Q5)	1998	11.6	2005	4.2	None	
Gini coefficient of inequality	1998	0.47	2005	0.27	None	
Target 1-B. Achieve full and productive employment and decent work for all, including women and youth.						
GDP per person employed (wage-salary employment; GDP at base prices - constant FY 04 prices)						McKinley, et al., July 2010
GDP per person employed (\$)	FY95	\$13,069	FY09	\$13,939	None	
Growth rate (%)	---	---	FY95-09	0.4%	None	
Population (%) in labor force (wage-salary & subsistence sectors)	1994	24.6%	2000	35.0%	None	Census 1994 & 2000
Employment-to-population ratio (formal wage and salary sector only; includes unemployed)	FY95	16.5%	FY09	14.0%	None	McKinley, et al., July 2010
Self-employed persons (formal sector excludes informal)	1994	5.3%	2000	1.5%	None	Census 1994 & 2000
Unpaid family workers as % of total formal wage and salary employment	1994	0.8%	2000	0.3%	None	
Working poor (% of households in lowest 3 expenditure deciles with 1 or more workers)	1994	NA	2000	77.9%	None	HIES 2005; Abbott, 2008
Target 1-C. Halve the proportion of people who suffer from hunger.						
Underweight children < 5 yrs of age	1989	13.3%	2005	15%	< 6.7%	Nat'l Nutrition Survey; DOH estimate
Population below minimum level of dietary energy consumption	Not Available				None	---

Off-track
Less challenging
local target is
achievable

Section 2.1.

MDG 1 - Eradicate Poverty, Hardship, and Hunger

Introduction. Poverty reduction lies at the heart of the Millennium Declaration and is the common thread linking the eight MDGs. For most countries, however, poverty reduction is the most challenging of the goals. In Oceania, MDG 1 has forced a thoughtful appraisal of what poverty means in the islands, how it can be measured, and what strategies will best ensure that each person benefits equitably from development.

In Micronesia, and elsewhere in Oceania, bountiful seas and lands have provided for the basic needs of the people over countless generations. A cultural tradition of “sharing and caring” has supported the aged and infirmed and helped the able-bodied withstand fleeting periods of hardship. This lifestyle, sometimes referred to as “affluent subsistence,” has led some people to question whether the concept of “poverty” is relevant in the islands.

Ideas about what constitutes a “good” life, however, are changing. Many people, especially youth, are no longer content with simple island subsistence. The need to purchase items that have come to be considered “essentials” and to pay cash for health care, medicines, schooling, power, water, transportation, and communications have created demand for cash income and formal sector jobs. At the same time, the physical environment is under stress; the lagoons and forests are no longer as productive as in the past. Migration from outer islands to main islands and from main islands to overseas destinations has divided families and kinship groups thus undermining the “caring and sharing” tradition. With all these factors in play, it is increasingly recognized that there are households and individuals who are “falling through” the traditional safety nets. Unfortunately, neither government nor non-profit groups are at this time well positioned to intervene.

For Oceania, the Asian Development Bank (ADB) has proposed that “poverty” be equated with “hardship” which is three-dimensional:

- Inadequate access to basic services;
- Inadequate access to opportunities to participate in socio-economic life;
- Inadequate access to productive resources and income generating supports (e.g. capital, credit, markets, skills) to meet the basic needs of the household and customary obligations to the extended family, community, and church.

Using this definition, an ADB-supported Participatory Assessment of Hardship (PAH) conducted in Chuuk, Pohnpei, and Yap in 2004, found that while only a few Micronesian households live in absolute poverty (where lack of resources undermines health and threatens life), hardship is relatively widespread. Households living with hardship lack resources (cash and subsistence) to meet their basic needs and social obligations. While households on remote islands, with limited opportunities to earn cash, may

be more likely to experience hardship than households on islands with better access to jobs and markets, hardship can be found in virtually every community (Abbott, 2004 and 2008).

MDG 1 measures poverty of consumption, the third dimension of the ADB definition. Hardship or poverty, however, is closely linked to the other MDGs. MDGs 2 and 3 (education and gender) measure poverty of opportunity. MDGs 4-6 measure poverty of services. MDG 7 measures the resilience of the environment to provide sustainable livelihoods for the current as well as future generations. MDG 8 measures political commitment to poverty reduction and the MDGs in general.

MDG Target 1-A. Poverty and Hardship

Global: Between 1990 and 2015, halve the proportion of the population living on less than one dollar per day (expressed in purchasing power parity or PPP).

FSM revision: Between 1990 and 2015, reduce the proportion of the population living below the food poverty line (absolute poverty) from 11.2% to 6.6% and the basic needs poverty line (relative poverty) from 28% to 14%.²³

²³ The target has been modified because the PPP statistic has not been calculated for FSM (or elsewhere in Oceania). The FPL and BNPL are used herein as proxy indicators for measuring progress against poverty.

Target 1-A has three indicators, modified for the FSM due to lack of data (Table 2.1-1). The core indicators:

- Incidence of poverty (proportion of population living below food and basic needs poverty lines);
- Depth and severity of poverty (poverty gap ratio and squared poverty gap ratio);
- Inequality of income distribution (share of national consumption by poorest 20% of households and Gini coefficient).

Measuring Poverty. Every country experiences some poverty because in every country there are households (and individuals) who are less well off than others. People who are less well off than their neighbors, however, may not be absolutely poor. To measure absolute poverty, the World Bank (1990) developed an indicator “persons living on less than US\$1 per day expressed in terms of purchasing power parity.”²⁴ PPP has not yet been calculated for Pacific Island nations. Consequently, for the purposes of assessing progress in relation to Target 1-A, it is possible only to consider measures of relative poverty based on the FSM’s own food and basic needs poverty lines.

Poverty Lines. Poverty lines are constructed to measure the cost of a minimum standard of living. The Food Poverty Line (FPL) represents the cost of purchasing (or alternately the market value of food produced at home) a basic nutritional diet. It is calculated based on food choices observed among low income households adjusted to reflect nutritional adequacy and consumption of 2100 kilocalories per adult equivalent per day.²⁵ Households, however, do not live on food alone. The Basic Needs Poverty Line (BNPL) reflects the food poverty line plus an allowance for non-food expenditures (or market value of non-food items produced at home) based on observed expenditures of low income households.

The FSM FPL and BNPL have been calculated based on the 1998 and the 2005 Household Income and Expenditure Surveys (Table 2.1-2). Increases in the food poverty line (average 8% per annum) and basic needs poverty line (average 6% per annum) reflect increasing costs of basic goods and services, changing consumer preferences, and both direct and indirect effects of modernization.²⁶

In looking at 2005 figures, poverty lines for Kosrae, Pohnpei, and Chuuk do not vary significantly, poverty lines for Yap are substantially higher. Yap also experienced a higher than average increase in the food poverty line between the two survey years (average 20% increase per annum). FSM poverty lines are somewhat higher than for Oceanic countries south of the equator, a reflection of limited productive resources and resulting dependence on imports in the FSM.

Table 2.1-2. Household Food and Basic Needs Poverty Lines, 1998 and 2005
(US\$ Per Household Per Year, Adult Equivalent Method)

	Food		Basic Needs	
	1998	2005	1998	2005
National	\$3,241	\$5,027	\$5,693	\$8,031
Chuuk	\$3,658	\$4,801	\$6,150	\$7,174
Kosrae	\$3,100	\$4,908	\$6,626	\$8,204
Pohnpei	\$2,933	\$4,882	\$5,120	\$8,508
Yap	\$2,626	\$6,394	\$6,738	\$9,700

All estimates are based on FSM Household Income and Expenditure Surveys (1998 and 2005) as analyzed by David Abbott, 2004 and 2008.

²⁴ Purchasing power parity (“PPP”) is a statistical measure that allows cross-country comparisons to be made by comparing the cost of a standard basket of goods in different countries or locales.

²⁵ Adult equivalent is a statistical measure that adjusts expenditures to reflect the fact that young children do not consume as much as adults.

²⁶ For example, when electric power becomes widely available on an island, it quickly becomes the societal “norm” for households at all economic levels thus directly contributing to an increase in the BNPL. Electric power also indirectly contributes to increases in FPL and BNPL by making it possible for other goods and services to become societal norms (e.g. electric lights, refrigerators, etc).

Poverty Prevalence. Table 2.1-3 shows the number of households and persons living below the food and basic needs poverty lines based on the 2005 HIES. Approximately 1-in-4 households and 1-in-3 individuals live below the BNPL.²⁷ Kosrae and Pohnpei have the highest rates of poverty; Yap has the lowest.

Vulnerability. Households or persons with expenditures less than 10% above the BNPL are considered vulnerable to poverty. In 2005, 4.8% of households nationwide were vulnerable (Chuuk, 5.0%; Kosrae, 0.4%; Pohnpei, 5.0%; Yap, 4.7%). Since the 2005 survey, increased oil and food prices have created widespread hardship while the number of jobs has declined especially in the relatively higher paid public sector jobs (see Target 1-B). It is probable that many households vulnerable to poverty in 2005 have subsequently slipped into poverty and that the poverty rate has increased. Further analysis, however, must await the next HIES.

Depth and severity of poverty. One measure of severity of poverty is the Food Poverty Line (FPL). Households lacking resources to provide members with a nutritionally adequate diet will experience hardship when balancing food expenditures against non-food needs. Approximately 1-in-10 persons nationwide live in households where expenditures are below the Food Poverty Line and on this basis, might be considered to be absolutely poor (Table 2.1-3). This proportion is highest in Chuuk (12.2%) and lowest in Yap (4.0%). Two other indicators are commonly used to describe the depth and severity of poverty. The Poverty Gap Index (PGI) measures the depth of poverty by calculating expenditures necessary to raise every poor household to the BNPL (Table 2.1-4). The PGI in 2005 was 9.3 indicating that the average poor household was 9% below the poverty line. This represents a modest decline since 1998 (PGI, 9.8).

The Squared Poverty Gap Index (SPGI) measures the severity of poverty by giving more weight to the poorest households with the largest poverty gap. The SPGI has decreased since 1998; nationally from 4.8 to 4.0 with decreases in all states (Table 2.1-4).

Trend Analysis. The FSM is one of only six Oceania countries that has conducted two HIES surveys analyzed from a poverty perspective. Unfortunately the data from the two FSM surveys are not fully compatible. The 1998 survey calculates poverty on the basis of head count while the 2005 survey calculates poverty on the basis of consumption per adult equivalent (p.c.a.e.).²⁸ To compare the two surveys, 2005 data have been recalculated using the head count method (Figure 2.1-1). Poverty rates nationally increased moderately between 1998 (27.9% of persons) and 2005 (31.4% of persons).

Increases in Yap and Pohnpei were also moderate while in Chuuk there was a small decline. In Kosrae, however, poverty rates skyrocketed from 12.3% to 32.1%, the result of public sector retrenchment there without comparable private sector growth. In light of the economic shocks the nation has endured between 1998 and 2005 as a result in step-downs in COFA funding and public sector retrenchment, the small rate of increase could be considered a positive development indicative of resilience in the subsistence sector.

Table 2.1-3. Households and Persons Below Food and Basic Needs Poverty Lines, 2005
(Consumption per adult equivalent per year)

Location	Households		Persons	
	Food	Basic Needs	Food	Basic Needs
FSM	7.8%	22.4%	11.0%	29.9%
Chuuk	9.6%	23.1%	12.2%	28.7%
Kosrae	7.1%	27.1%	8.8%	34.5%
Pohnpei	6.8%	24.4%	10.9%	33.9%
Yap	2.0%	11.4%	4.0%	19.4%

Source: Abbott, D. (2008). *The Federated States of Micronesia: Analysis of the 2005 Household Income and Expenditure Survey*, Table 13 (p. 25).

Table 2.1-4. Depth and Severity of Poverty
(Poverty Gap Index and Squared Poverty Gap Index)

Area	Poverty Gap Index (depth of poverty)		Squared Poverty Gap Index (severity of poverty)	
	1998	2005	1998	2005
FSM	9.8	9.3	4.8	4.0
Chuuk	12.8	8.5	6.3	3.6
Kosrae	7.2	9.4	3.5	3.7
Pohnpei	7.8	10.8	3.8	5.1
Yap	6.0	5.2	2.8	1.7

All estimates are based on FSM Household Income and Expenditure Surveys (1998 and 2005); source of analysis Abbott (2004 and 2008).

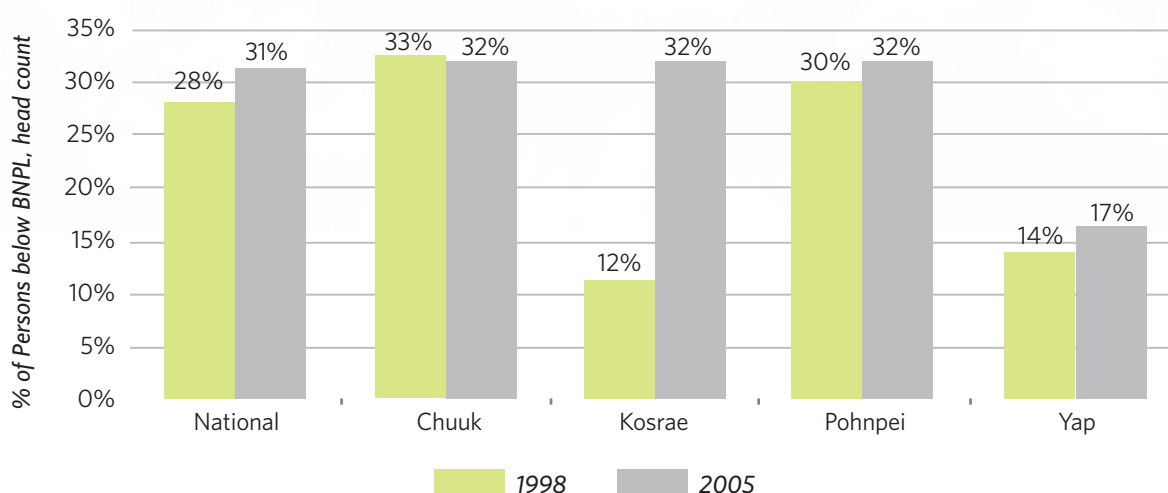
²⁷ The higher proportion of individuals living below the poverty line is due to lower income households having more members on average than higher income households.

²⁸ For further discussion of these terms (head count and p.c.a.e.), see footnote 14 and Box 1-2 at the end of Section 2.1. of this report.

Equality. Large gaps between the “haves” (households with high income) and the “have nots” (households with low income), violate human rights and create social stresses that feed discontent, crime, and political instability. Three commonly used measures of equality (Table 2.1-5) are:

- Expenditure share of poorest 20%;
- Ratio of expenditures of households in the lowest expenditure quintile to those in the highest quintile “Q5:Q1”;²⁹
- Gini coefficient.

Figure 2.11. Persons Below Basic Needs Poverty Line, 1998 & 2005
HIES Data Analyzed by Abbott 2008, Head Count Method



Note: Head count yields higher poverty rates than p.c.a.e; hence 2005 rates above differ from those shown in table 1-3.

All three indicators suggest that while the FSM experiences significant inequality between high income households (generally those with one or more members working in the public sector) and low income households (those working in the private or informal sectors), inequality has narrowed between 1998 and 2005. This is particularly evident in the Q1:Q5 ratio which has declined by about two-thirds at both state and national levels. Likewise, the Gini coefficient also suggests a narrowing of inequality.

Who are Poor? The 2005 HIES shows that households in the lowest expenditure quintiles are disproportionately headed by persons of low education level (Figure 2.1-2) without wage/salary income or with wage/salary income derived from the private sector (Abbott, 2005, p. 32). There is also a clear gender bias. Nationwide 20% of households are headed by females but female-headed households comprise 39% of households in the

Table 2.1-5. Measures of Expenditure Equality

Source: HIES Analyzed by D. Abbott of UNDP

	FSM	Chuuk	Kosrae	Pohnpei	Yap
Expenditure Share of Poorest Quintile (20%) of Households					
2005	8.5%	8.4%	9.6%	8.4%	11.1%
Ratio of Lowest Expenditure to Highest Expenditure Quintile					
1998	11.6	13.8	3.9	9.0	8.4
2005	4.2	4.2	3.6	4.1	3.2
Gini Coefficient of Inequality					
1998	0.47	0.51	0.31	0.44	0.42
2005	0.27	0.27	0.25	0.27	0.24
Note: Gini Coefficient of 0 indicates perfect equality; Gini Coefficient of 1 indicates perfect inequality.					

²⁹ In analyzing income and/or expenditures, households are frequently classified into quintiles (5ths) or deciles (10ths) for purposes of inter-group comparison. Households in the lowest three deciles (30%) are generally considered to be poor relative to others in the same population.

lowest three expenditure deciles.³⁰ Only in Yap do female-headed households appear not to face significant economic disadvantage (Figure 2.1-3). Further discussion of 'women and the labor force' can be found under MDG 3.

When asked "who are the poor?" respondents in the 2004 Participatory Assessment of Hardship (PAH) identified the following (Abbott, 2004):

- Unemployed and landless;
- Uneducated youth who did not finish school;
- Teenage couples with children;
- Women (widows and single mothers) and men (widowers and elderly);
- People who "own nothing" and are without education or skills;
- Large families and families without support from their extended families.

Safety Net. No discussion of poverty in the FSM is complete without mention of the safety net that mitigates to some degree the impact of low wages relative to prices and high levels of unemployment. Three important components of the safety net are:

- Access to land and sea;
- Basic services underwritten by government;
- Family support measured here by remittances.

Virtually all Micronesians have access to land and sea resources for planting crops, fishing, and reef gleaning. Although there is no quantified data relating to landlessness, it is widely accepted that every Micronesian has some land or sea use rights, even if he/she may not have ownership rights. In Chuuk among the poorest 20% of households, 48% of income derives from subsistence - production based on customary land and sea use rights (SBOC, 2007, Table A6). The constraining factor is that sometimes land and sea use rights are not readily accessible to individuals who have moved away from their home islands. This safety net may not be of practical benefit for example to some outer island households living on the main islands.

A number of basic services are provided by government either free or at highly subsidized rates. These important parts of the safety net include:

- Constitutionally guaranteed right to basic education;
- Constitutionally guaranteed right to free or subsidized health care;
- Subsidized basic services including power, water, sewer (where these services are available), inter-island transportation, and communications.

Finally, the extended family is an essential part of the safety net. By custom, families look after family so that homelessness and the absolute destitution that accompanies homelessness do not exist in the FSM. While inter-island migration has weakened some aspects of family support, it has spawned rapid growth in income subsidy through remittances. Since FY 1995, the net inflow of official remittances recorded by the financial services system has increased from a negligible \$0.5 million to \$13.5 million (FY 2008). Although the state-by-state breakdown is not available for this data series, the 2005 HIES shows that remittances are a particularly important source of income in Chuuk across all income levels. Remittances, while important in the other states, flow more toward lower income households (Table 2.1-6).

	Chuuk	Kosrae	Pohnpei	Yap
Income (%) from remittances	5.4%	1.9%	2.5%	0.5%
Lowest Income (Q1) Households	6.9%	4.9%	4.2%	0.6%
Highest Income (Q5) Households	4.8%	1.9%	2.0%	0.3%

Source: 2005 HIES, Table A.6 (See SBOC, 2007).

³⁰ Female headed household is defined as "A family with a female householder and no spouse of householder present" (Census, 2000).

2015 and Beyond. The actual number of households and persons living below the BNPL increased from 1998 to 2005. The trend however is toward greater inter-household equality. This is due in part to remittances and in part to public sector retrenchments (reduction in force, compensation, or hours and early retirement) that have the effect of reducing income/expenditures of higher earning households as opposed to measures that increase income/expenditures by lower earning households.

Text Box 2.1-1 summarizes the recommendations for alleviating poverty and improving the quality of life made by participants in the Participatory Poverty Assessment of 2004. Essentially people called for: (a) better basic services, especially education; (b) better infrastructure, especially transportation; (c) better participation by ordinary people (including women) in decision-making, and (d) targeting of interventions to help people at special disadvantage. Abbott (2008) writing for the Asian Development Bank, has also made recommendations for moving the FSM forward with respect to MDG 1. These include regulatory and fiscal reform, improved governance, private sector development, investment in agriculture, and improvements in health, education, and infrastructure especially in remote areas.

Box 2.1-1. Priorities of the People of FSM

These priorities were expressed during the consultations in Pohnpei, Chuuk and Yap states during the participatory assessment of hardship conducted by ADB in 2004.

1. Improved access to **income generating opportunities** as well as improved access to basic services were the common priorities identified by men, women, and youth. Emphasis was placed on access to scholarships and skills training to improve chances to find employment or other income opportunities especially for those who have left school without earning a high school diploma. Also, improved market access for people from the rural and outer islands was identified as a priority.
2. Improved **basic services** and infrastructure delivery, especially transport to connect outer islands to state and overseas capitals to improve access to markets (e.g., to sell local produce, fish catch, and handicrafts), higher education, health, power supply, and water were the most common priorities.
3. Improved **access to information**, particularly family planning, good parenting, community planning and household management skills were priorities shared by men and women. People were increasingly recognizing the value of planning their families to be able to provide for their children's needs such as food, clothing, education, and health. Learning proper parenting skills was also increasingly valued to effectively deal with changes due to the modernization of traditional societies (e.g., alcohol and drug abuse) as well as to develop children's potentials to get a degree and a good job.
4. Access to **skills and recreation centers** to cater to youth drop-outs and women who did not complete their education and have no means of accessing skills to find a job, improve craftwork or start a small business was a priority particularly shared by women and youth to improve their economic opportunities.
5. Measures to **stop alcohol and drug consumption** were a priority identified by women's groups throughout all three states. Laziness or lack of personal motivation, misallocation of household budget from family's basic needs (e.g., food, education) to alcohol or drugs as well as consistent disagreements among couples due to drug or alcohol were factors cited for this priority. This underlines the increasing role of drugs and alcohol in all sample states in causing stress and tension within the household, particularly for women.
6. Enforcement of **child support law** was a priority identified in Chuuk where an increasing number of single women were perceived as causing hardship for the women's families called upon by custom to provide for children of separated or single parents

Source: ADB (2004) Priorities of the People: Hardship in the Federated States of Micronesia. Manila: Author.

Although the Participatory Assessment of Hardship and the poverty-oriented analyses of the HIES data were part of a cooperative ADB-FSM project signed in 2002 intended to prepare a FSM Poverty Reduction Strategy, a formal policy or strategy has yet to be developed. Poverty reduction is an implied priority within the Strategic Development Plan but is not explicitly addressed by the plan other than fleeting references in the gender, health, and agriculture chapters. The implied anti-poverty economic strategy of choice is job creation through private sector development. Since the plan was prepared, jobs have declined (see Target 1-B). It therefore seems imperative that a targeted poverty strategy and policy be developed if the FSM is to progress against MDG Target 1-A. Elements of an antipoverty policy would include a mixture of measures already underway as well as some new initiatives.

- Explicitly integrate poverty targets into the Strategic Development Plan.
- Use Geographic Information System (GIS) technologies to create a poverty map showing communities that experience high levels of poverty (broadly defined to encompass low income, lack of jobs, lack of basic services, and lack of opportunities).
- Improve education in order that youth are better prepared to take advantage of opportunities open to them.
- Continue to pursue macro-economic strategies to improve private sector performance and create jobs;
- Increase investment in the non-formal economic sector (small scale fisheries-agriculture, crafts, and other localized enterprises) to help producers increase productivity, marketing, and sustainable production;
- Develop new lines of credit to help small producers modernize their operations;
- Develop micro-initiatives to address opportunities and constraints to economic development found in pockets of poverty (as identified during poverty mapping).

Since Chuuk is the largest state and has the largest number of poor people and poor households, special attention should be given to supporting Chuuk to develop a poverty reduction strategy.

MDG Target 1-B. Employment

Achieve full and productive employment and decent work for all, including women and young people.

MDG Target 1-B addresses employment with a focus on wage-salary employment and the status of youth and women. There are four indicators:³¹

- Growth rate of GDP per person employed;
- Employment to population ratio;
- Proportion of employed persons living below \$1 (PPP) per day;
- Proportion of own-account (e.g. self-employed) and contributing family workers in total employment.

Three of these indicators can be assessed in the FSM: (i) growth rate of GDP per person employed; (ii) employment-to-population ratio; (iii) own account and (unpaid) family workers. Data on “working poor” derived from the HIES is used as a proxy measure for the indicator “employed persons living below \$1 PPP per day.”

Employment Status. Between FY 1995 and FY 2009, one-fifth of public sector payrolls were cut without commensurate growth in private sector jobs resulting in an overall job loss of 10% (Table 2.1-7). The national employment-to-population rate is 14% (FY 2009) meaning that on average every employed person supports 6 others. The situation in Chuuk is particularly serious. Between FY 1995 and 2009, Chuuk lost one-third of its payroll and by FY 2009, every employed person there supported on average 12 others (Table 2.1-8). Despite disappointing job performance, national GDP per employee has risen modestly suggesting increased productivity per worker (Table 2.1-9).

Table 2.1-7. Changes in Wage/Salary Employment, FY 95-FY 09

Area	Persons Employed		% Change
	FY 95	FY 09	
National	17,346	15,596	-10%
Chuuk	6,097	4,068	-33%
Kosrae	1,444	1,429	-1%
Pohnpei	7,197	7,461	+3.6%
Yap	2,592	2,638	+1.8%

Source: McKinley, et al., July 2010

³¹ There are three data sources for employment; numbers are broadly comparable but there are some differences in classification. The census and HIES surveys classify persons as: (i) employed in the formal wage-salary sector, (ii) unemployed (meaning available to take a job if offered and actively seeking a job); (iii) working in fisheries-agriculture - subsistence (meaning surplus production is not marketed for cash); (iv) working in fisheries- agriculture - market-oriented (meaning surplus production is sold for cash); or (v) not in the labor force. In this report, comprehensive labor force statistics are based on the 1994 and 2000 census.

Annual monitoring of persons employed is derived from the FSM Social Security Administration database. For annual statistical purposes “employed persons” are person who work in a registered business, chartered non-profit corporation, or public enterprise. In this report, social security data forms the basis for employment-to-population ratios and GDP per employed person statistics.

Youth and Women. There are no recent data to reflect the employment status of women and youth.³² Tables 2.1-10 and 2.1-11 are based on 1994 and 2000 census data. While numbers and rates have undoubtedly changed, note should be made of:

- The large increase in women in the labor force between 1994 (30% of women 15 years of age and older) and 2000 (50% of women);
- The decline in wage-salary employment among both men and women accompanied by a large increase in subsistence sector employment;
- The high level of subsistence sector employment among women; (although not shown, the rate is particularly high in Yap);
- The high level of unemployment for both men and women (22% of the total labor force);
- The very high rate of unemployment among youth (1 out of every 3 potential workers).

In view of job losses since 2000, unemployment rates have undoubtedly risen with youth disproportionately affected. Poor job prospects, especially for youth, contribute to poverty, substance abuse, crime, and suicide. Ultimately, political instability could also result.

Table 2.1-8. Employment to Population Ratio
Population (%) in Wage/Salary Sector

	FY 95	FY 99	FY 03	FY 06	FY 09
National	16.5%	15.0%	15.3%	15.0%	14.4%
Chuuk	11.4%	9.5%	10.0%	9.6%	7.7%
Kosrae	19.6%	18.8%	19.4%	18.3%	17.3%
Pohnpei	21.3%	19.8%	19.5%	20.3%	21.4%
Yap	23.2%	24.4%	25.2%	21.6%	22.4%

Source: McKinley, et al., July 2010

Table MDG 2.1-9. GDP Per Employed Person

	FY1995	FY2003	FY2006	FY2009
Base prices; FY 04 constant prices (US\$ millions)	\$226.7	\$229.8	\$224.3	\$217.4
Employed persons (wage/salary sector)	17,346	16,536	16,298	15,596
GDP/Employed Person	\$13069	\$13897	\$13762	\$13939
Av. annual growth rate (GDP/ Employed Person)	---	+0.8%	-0.3%	+0.4%

Source: McKinley, et al., July 2010

Table MDG 2.1-10. Labor Force Status by Gender, 1994 and 2000

		1994			2000		
		Both Sexes	Male	Female	Both Sexes	Male	Female
Total population		105,506	53,923	51,583	107,008	54,191	52,817
Potential Labor Force (Persons 15+)	Number	59,573	30,127	29,446	63,856	31,821	32,015
	% of population	56.5%	55.9%	57.1%	59.7%	58.7%	60.6%
In Labor Force	Number	25,972	17,098	8,874	37,414	21,376	16,038
	% of potential labor force	43.6%	56.8%	30.1%	58.6%	67.2%	50.1%
Wage/Salary (Formal) Sector	Number	14,381	10,016	4,365	13,959	9,343	4,616
	% of labor force	55.4%	58.6%	49.2%	37.3%	43.7%	28.8%
Subsistence (Non Formal) Sector	Number	7,375	5,259	2,126	15,216	7,614	7,602
	% of labor force	28.4%	30.8%	24.0%	40.7%	35.6%	47.4%
Unemployed	Number	4,216	1,833	2,383	8,239	4,419	3,820
	% of labor force	16.2%	10.7%	26.9%	22.0%	20.7%	23.8%

Source: 2000 Census of Population and Housing, Volume II, Chapter 9.

³² Employment data are drawn primarily from Social Security records. The FSM Social Security Administration does not routinely disaggregate data by gender or age.

Table 2.1-11. Youth Unemployment, 1994 and 2000

Age Groups	1994			2000		
	Both Sexes	Male	Female	Both Sexes	Male	Female
All Ages	16.2%	10.7%	26.9%	22.0%	20.7%	23.8%
15-19	37.4%	30.8%	48.3%	36.3%	35.9%	36.9%
20-24	29.9%	20.8%	42.3%	34.3%	34.2%	34.4%
25-29	18.2%	12.2%	28.4%	27.9%	26.7%	29.4%
30-34	13.0%	8.9%	20.9%	21.7%	19.8%	24.0%

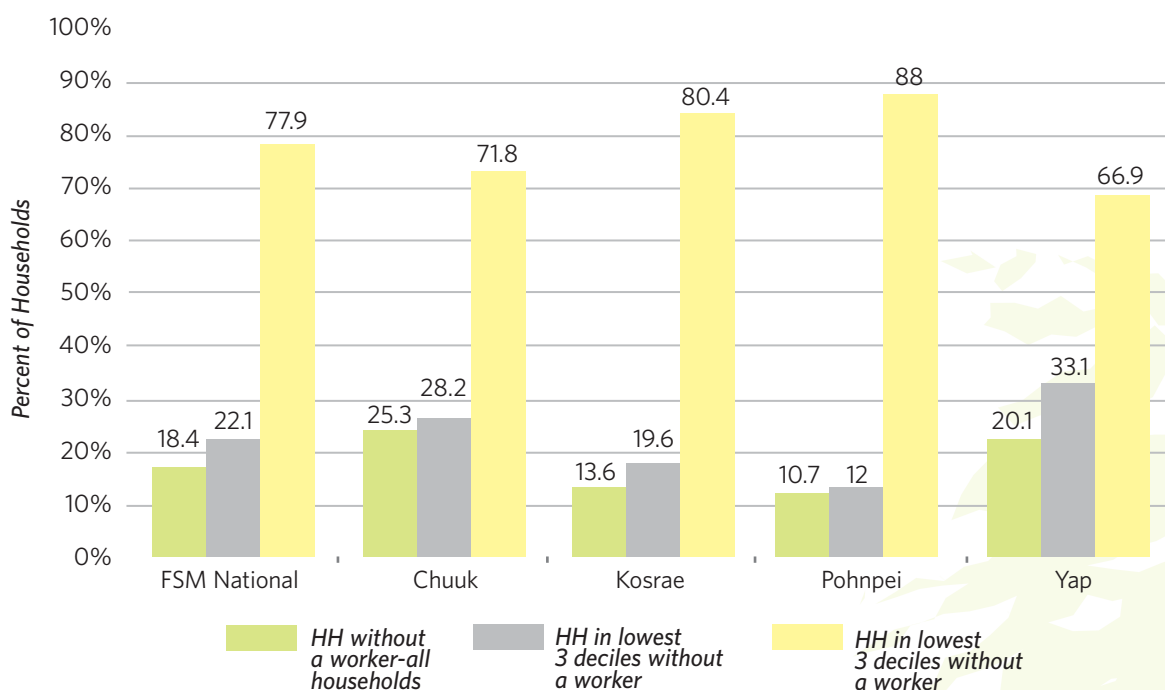
Source: 2000 Census of Population and Housing, Volume II, Table 9.6.

Own Account and Unpaid Family Workers. The most recent data are drawn from the census. In 2000, there were a total of 205 (73 females; 132 males) self-employed persons working in the FSM representing 1.5% of the wage-salary labor force. There were a total of 46 unpaid family workers (13 female, 33 male) representing 0.3% of the wage-salary labor force. Both figures are likely to be underreported as many people working in the informal sector (subsistence agriculture and fisheries) can rightly be classified as self-employed. It is also likely that many people classified as not in the labor force are in reality unpaid family workers.

Working Poor. HIES data reveal that households with wage- salary income are somewhat less likely to fall below the basic needs poverty line than households with no income or other forms of income (Figure 2.1-2). The relationship between employment and poverty in the FSM is not, however, as strong as might be expected. The large number of poor households (households in lowest three expenditure deciles) with one or more workers indicates that many households constitute “working poor.” The proportion of working poor households is particularly high in Pohnpei.

Figure 2.1.2. Households without a Worker and Working Poor

Source: Based on 2005 HIES analyzed by Abbott (2008), Tables A22 & A23



Target 1-C has two indicators:

- Prevalence of underweight children under-five years of age
- Proportion of population below minimum level of dietary energy consumption

Target 1-C. Hunger

Between 1990 and 2015, halve the proportion of people who suffer from hunger.

Underweight Children. The Department of Health routinely monitors low birth weight and anemia rates (for mothers and children); it does not monitor weight for age or height. The only available data on underweight children draws from the 1987 National Nutrition Survey (13.3% of children 0-4 years of age were then underweight). Subsequently, the rate has been estimated at 15% for 1997 (Abbott, 2004) and 15% in 2000 (World Fit for Children +5 report, 2002). The 2005 maternal and child health needs assessment and the 2010 maternal and child health work plan both emphasize the importance of nutrition improvement for safeguarding health of mothers and children. The emphasis placed on nutrition in these documents suggests that routine monitoring of the nutrition status, especially of children, may be warranted. There is a widespread belief that under-nutrition in the FSM primarily reflects lack of knowledge and/or social problems rather than lack of food (or money to purchase food). Given the poverty indicators and evidence of growing poverty/hardship, this assumption should be subjected to more rigorous investigation.

Dietary Energy Deficiency. There are no data to directly assess the second indicator – proportion of population below minimum level of dietary energy consumption. Households falling below the food poverty line are used herein as a proxy measure for this indicator (see Table 2.1-3).

FSM and the Region.³³ Across the region (excluding PNG), 1-in-4 households and 1-in-3 individuals are estimated to live below their national poverty lines. This is virtually identical to the rate found in the FSM (2005). The incidence of food poverty in the FSM is also similar to the rest of Oceania (average 5-7%). Only six Pacific nations have two poverty data points. In FSM and four of the five other countries, there is evidence of a small but significant increase in basic needs poverty. (The exception is Tuvalu where poverty declined between the two data points). FSM is also similar to other countries in the region in terms of depth of poverty (FSM, 9%; regional average 8% and range 5.6%-11.2%).



Photo courtesy of FSM Information Services

2015 and Beyond. Poverty indicators for the FSM have deteriorated only marginally during a period of extreme economic volatility as Compact revenues declines, allocation formulas changed, and public sector jobs were lost. Overall, this is a positive indicator indicating resilience in the non-formal economic sector.

³³ Source of this section: UNDP and PIFS, (June 2010). Cairns Compact Deliverables: 2010 MDG Regional Tracking Report.

COFA revenues, however, will continue to decline and private sector job growth has been stagnant for more than a decade. Most job growth has taken place in the subsistence sector but there are indications that productivity there is declining as more people struggle to make their livelihood from a limited and deteriorating resource base. (Under MDG 7 unsustainable harvest of marine products and deforestation are discussed; these issues are especially problematic in Pohnpei and Chuuk). Efforts to diversify official development assistance and attract foreign direct assistance have also been slow to yield results (see MDG 8). With virtually no prospects for job growth in the public sector and slow growth in the private sector yet increasing demand for cash, people will continue to turn either to the non-formal sector or to outmigration.

The FSM is seriously “off-track” with respect to MDG 1. In view of the macro-economic situation, the best case scenario is to maintain poverty levels at 2005 rates through to 2015 but there is no realistic prospect of meeting the MDG target of cutting poverty rates by half. Addressing poverty over the longer term through private sector job creation is the focus of the Sustainable Development Plan but implementation faces many local challenges made more challenging by the current global economic environment.

Although poverty alleviation is implied in the Strategic Development Plan, it is not explicitly addressed anywhere in the document. To address poverty and move the FSM forward on MDG 1, a formal Poverty Alleviation Strategy is needed that combines macro-economic strategies with targeted micro-strategies to address the needs of specific populations living in or at risk of poverty. Among the four states, priority needs to be given to anti-poverty strategies in Chuuk with particular emphasis on the situation of young people.



Photo courtesy of Ecky Upritchard

Text Box 2.1-2. Correcting some Misconceptions and Clarifying some Concepts

In discussions around MDG 1, it seems apparent that many people are not fully aware of what constitutes “income” or “expenditures” in the Household Income and Expenditure Surveys. Many seem to believe that the HIES measures only cash. This is incorrect. The HIES measures both cash AND in-kind income. In-kind includes the market value of food and other goods produced at home for home consumption and “imputed rent.” Imputed rent is the market value of a homeowner’s home were he/she to pay cash rent for comparable housing in the marketplace. Nationwide, in 2005, 38% of household income was in-kind with in-kind income particularly important for households in the lowest expenditure quintile. 75% of income for low-expenditure households in Chuuk derived from non-cash (in-kind) sources. This is one reason that poverty levels in Chuuk have held stable despite a one-third reduction in formal sector jobs. High levels of remittances (discussed previously) also mitigate poverty there.

Income Derived from Subsistence Production and Imputed Rent, 2005

Source: Household Income and Expenditure Survey, 2005, Table 6.A.

	National	Chuuk	Kosrae	Pohnpei	Yap
Household income derived from subsistence (value of food & other products produced at home for home consumption)	18.0%	26.3%	8.5%	8.4%	29.7%
Quintile 1 (lowest expenditure households)	31.2%	48.1%	16.5%	20.6%	40.4%
Quintile 5 (highest expenditure households)	8.1%	10.2%	5.0%	3.9%	22.3%
Household income derived from market value of owner occupied housing (imputed rent)	10.3%	13.7%	8.6%	8.6%	8.5%
Quintile 1 (lowest expenditure households)	21.8%	25.3%	23.2%	21.7%	13.9%
Quintile 5 (highest expenditure households)	6.7%	8.6%	5.3%	5.8%	6.4%
Household income (%) non-cash	38.3%	40.0%	17.1%	17.0%	38.6%
Quintile 1 (lowest expenditure households)	53.0%	73.4%	40.0%	42.3%	54.3%
Quintile 5 (highest expenditure households)	14.8%	18.8%	10.3%	9.7%	28.7%

Clarifying Methods of Calculating Poverty

There are two methods used to calculate poverty. Since this can create some confusion for the reader, an attempt is made here to provide clarification. The FSM 1998 HIES and poverty assessment used the head count method. Subsequently, there has been further work on poverty indicators at regional and global levels; indicators are now being standardized using the adult equivalent method (p.c.a.e.). Adult equivalent data can be translated to head count data but head count data cannot easily be translated to adult equivalent data. Consequently, in this MDG report whenever reference is made to 2005 indicators alone, adult equivalent data is reported as it is these data that can be compared with data from other countries and regions. However, when comparison is made between the situation in 1998 and 2005 within the FSM, it is necessary to use head count data. Head count yields higher poverty rates than adult equivalent data.

- Head count methods count every person within a household as a one person-unit. This does not take into consideration the fact that infants and children do not consume as much as adults.
- Adult equivalent methods count every person in the household as a proportional unit with children under the age of 15 counted as half of an adult. Accordingly a household with 2 adults and two children is equivalent to a household with three adults (Abbott, 2008, p. 16).



Photo courtesy of FSM Information Services

Millennium Development Goal 2 : Achieve Universal Primary Education

Table 2.2-1. FSM National Indicators at a Glance - MDG 2 Achieve Universal Primary Education

Indicator	Base Data		Most Recent Data		FSM Target	Data Source
	Year	Value	Year	Value		
Target 2.A: Ensure that by 2015 children everywhere, boys and girls alike, will complete a full course of primary schooling leading to competency in core subjects.						
Net enrolment in primary school	---	NAv	2009	96%	100%	FSM DOE
Gross enrolment in primary school:						
- Total	1994	93.7%	2000	92.3%	100%	Census
- Male		93.5%		91.7%	100%	
- Female		93.9%		92.9%	100%	
Grade 8 students achieving competency in:						
- Reading	2009	40%	---		90% +	FSM DOE (JEMCO 2009)
- Literature		47%		90% +		
- Vernacular		NAv.		90% +		
Proportion of students starting Grade 1 who reach Grade 3 (grade 5 data unavailable)	1997 2000	92%	2007 2009	86%	100%	Statistical Yearbook; JEMCO Rept.
Secondary school gross enrollment						
- Total	1994	81.4%	2000	72.3%	100%	Census
- Male		78.4%		68.1%		
- Female		84.7%		76.7%		
Secondary school net enrollment	2009	68%	2010	84%	100%	FSM DOE
Literacy rate of 15-24 years old						
- Male	1994	96.2%	2000	94.2%	100%	Census
- Female		96.6%		96.0%		
Literacy rate of 15-19 years old						
- Total	1994	96.3%	2000	95.4%	100%	Census
- Male		96.2%		94.5%		
- Female		96.7%		96.4%		
Literacy rate of 20-24 years old						
- Total	1994	95.6%	2000	94.7%	100%	Census
- Male		96.2%		93.9%		
- Female		96.7%		95.6%		

Section 2.2.

MDG 2 - Achieve Universal Primary Education

Introduction. Education underpins economic and social development and is possibly the single most important strategy for achieving poverty reduction. Education is a high priority of the FSM Government; on average 35% of COFA (Section 211) funds are earmarked for education (United States GAO, 2006; see MDG 8).

The FSM education system is based on an American model. Optional pre-primary education for children 4-5 years of age is provided as part of the public education system with additional programs operated by the private sector (mainly churches).³⁴ Approximately 34% of age-eligible children participate in pre-primary programs (DOE, 2009). Compulsory primary schooling extends from grades 1-8 serving children 6-13 years of age. Secondary schooling (grades 14-17) is non-compulsory with admission based on competitive examinations. The College of Micronesia headquartered in Pohnpei has campuses in all FSM states and offers post-secondary education at the associate degree, diploma, and certificate levels as well as continuing education for adult learners.



Photo courtesy of Maricruz Sanchez Collazo

The FSM education system is comprised of the National Department of Education and four State Departments of Education. The national government is responsible for developing educational standards and evaluating performance, seeking and managing external funding, and providing technical assistance to the state departments. National government is also responsible for post-secondary education. It is the state departments of education, however, that manage and maintain schools, hire and supervise teachers, and deliver student instruction.

By 1994, primary school enrollment rates exceeded 90% indicating that the FSM was well on its way to achieving MDG 2. The most recent statistics, although still indicating enrollment rates in excess of 90%, suggest some regression away from the target; this is a source of some concern. Also of concern is the quality of instruction/learning and the relevance of the curriculum to the daily lives of citizens and long-term development needs of the nation.

The FSM Department of Education routinely monitors 20 indicators of education system performance which form the basis for annual reports to the U.S. Government as part of the COFA funding allocation process. Only net enrollment appears as part of both the national core indicators and the MDG indicators. As an initial step toward localization, MDG indicators discussed herein have been expanded to include outcome measures relevant to quality of instruction/learning.

MDG Target 2-A. Basic Education

Ensure that by 2015, children everywhere, boys and girls alike, will be able to complete a full course of primary schooling leading to competency in core subjects.³⁵

MDG 2 focuses on universal participation in primary education for both sexes and across all regions of the country. It is supported by three indicators: net primary school enrollment ratio, primary school survival, and literacy rates among young adults (ages 15-24). To these global indicators, FSM has added qualitative indicators (Tables 2.2-1 and 2.2-6).

³⁴ Integration of pre-primary into the public school system began with COFA II. Prior to this, pre-primary was managed by the non-profit Community Action Agencies with funding granted through the U.S. Head Start Federal Program. Integration has been completed in Pohnpei and Kosrae and is still in progress in Yap and Chuuk (FSM DOE, 2009).

³⁵ The phrase "leading to competency in core subjects" has been added by the FSM to measure quality of instruction/learning.

Enrollment. Two commonly used measures of school participation are gross and net enrollment rates:³⁶ Gross enrollment is a quick measure calculated from census data. Table 2.2-2 suggests a modest decline in enrollment rates between 1994 and 2000, a cause for concern. Also significant, in view of the MDG emphasis on gender equity, is the near parity between girls and boys in elementary schools and the higher levels of enrollment for girls in secondary schools.

Net enrollment is a more accurate measure of school participation. It removes from the student population children who are under-aged and over-aged for their grade level. Net enrollment has only recently been added to the FSM's routine statistical data base (Table 2.2-3). Data are not yet available to assess trends or gender parity. Net enrollment is high indicating that the FSM is approaching universal primary school participation.

Descriptive education statistics (teachers, students, schools) are presented in Table 2.2-4.

Primary School Survival Rate. For purpose of the MDGs, the primary school survival rate is defined as the proportion of Grade 1 students who complete Grade 5. The rate measures student attrition (withdrawal) from the education system without regard to the reason for withdrawal (e.g. drop-out, transfer-out, death, or other reasons). This statistic has only recently been added to the education data base so that an official primary school survival statistic is available only for Grade 1 to Grade 3 (School Year 2007 through 2009). The official survival figure is 86% (FSM DOE). This indicates that 14% of children who entered grade one in 2007 had already withdrawn from the education system two years later; this is a relatively high rate.

Table MDG 2.2-2. FSM Gross Enrollment Rate, 1994 & 2000

	1994			2000		
	Total	Male	Female	Total	Male	Female
Elementary	93.7%	93.5%	93.9%	92.3%	91.7%	92.9%
Secondary	81.4%	78.4%	84.7%	72.3%	68.1%	76.7%

Source: FSM Census of Population and Housing, Volume 2 (2000), Table 8.5 (p. 62).

Table MDG 2.2-3. Net Enrollment Rate, SY 2008-2009

State	Preschool (Ages 4-5)	Elementary (Ages 6-13)	High School (Ages 14-17)	Total (Ages 4-17)
National	34%	96%	69%	78%
Chuuk	35%	94%	67%	77%
Kosrae	16%	88%	70%	71%
Pohnpei	35%	108%	67%	85%
Yap	45%	68%	83%	37%

Source: FSM Department of Education (2009). JEMCO Report.

**Table 2.2-4. Schools, Teachers, Students – FSM
SY 2006-07**

	National	Chuuk	Kosrae	Pohnpei	Yap
Schools					
Early Childhood	71	45	*	*	26
Primary	155	87	7	31	30
Secondary	28	21	1	3	3
Teachers					
ECE & Primary	1,510	657	161	383	307
Secondary	447	225	39	114	69
Teachers with college degrees (%)	62.5%	52.8%	95.5%	79.0%	36.8%
Students					
4-5 years old	1,861	889	68	636	268
6-13 years old	19,696	9,489	1,283	7,454	1,470
14-18 year old	8,189	4,087	620	2,569	952
Total	29,755	14,565	1,971	10,629	2,690

Source: 2008 FSM Statistical Yearbook, Chapter 11. Teachers with degrees: FSM DOE (JEMCO Report). Note: Early childhood classrooms in Kosrae and Pohnpei have been integrated into primary schools.

³⁶ Gross enrollment is students divided by estimated student-age population; net enrollment is students of appropriate age enrolled divided by estimated population of the same ages. Net enrollment does not include students that are under or over-age for the grade or schooling level.

Table 2.2-5: Primary School Survival for School Year 97-98 Grade One Cohort

Source: FSM Statistical Yearbook, Chapter 11

	Nat'l	Chuuk	Kosrae	Pohnpei	Yap					
Male and Female										
Grade 1-3	92%	94%	101%	92%	85%					
Grade 1-5	92%	94%	101%	89%	88%					
Grade 1-8	73%	66%	93%	82%	73%					
Grade 1-10	60%	51%	104%	43%	67%					
Grade 1-12	40.7%	NAv	NAv	NAv	NAv					
Male/Female										
	Male	Female	Male	Female	Male	Female	Male	Female	Male	Female
Grade 1-3	93%	92%	91%	97%	106%	96%	98%	86%	88%	85%
Grade 1-5	92%	92%	93%	96%	108%	93%	89%	89%	92%	80%
Grade 1-8	71%	76%	60%	72%	96%	89%	80%	83%	83%	70%
Grade 1-10	59%	62%	46%	56%	112%	96%	44%	42%	79%	55%
Grade 1-12	NAv	NAv	NAv	NAv	NAv	NAv	NAv	NAv	NAv	NAv

Unofficial survival rates can be gleaned from published enrollment statistics by grade (Table 2.2-5). This table traces the progression of the grade one cohort from School Year 97-98 through to graduation in School Year 2008-2009. It shows relatively high survival rates through Grade 5 but high attrition thereafter. By Grade 10, 40% of the cohort had withdrawn - 49% in Chuuk and 57% in Pohnpei. The table also shows that the relative parity in enrollment between girls and boys is due primarily to significantly higher survival rates for girls in Chuuk and to a lesser extent in Pohnpei. In Kosrae and Yap, there are pronounced gender gaps with girls withdrawing from school at significantly higher rates than boys from Grade 5 onward.

It must be emphasized once more that attrition is not the same as drop-out. The official definition of a drop-out is "a student who does not come to school for 40 days and does not request a transcript" (FSM DOE, JEMCO Report SY 2007-08). In practice, it appears that drop-out rates are frequently calculated on the basis of the number of students enrolling in a grade level at the beginning of the school year compared to the number remaining at the end of the school year (FSM DOE, JEMCO Report, SY 2007-08). This is obviously an erroneous method of calculation since it ignores students who do not return to school following the summer break (and therefore are not enrolled in a grade in the new school year). This method of calculation yields an official drop-out rate for grades 1-12 of only 2% for SY 2007-2008 and 1.5% for SY 2008-2009 (FSM DOE, JEMCO Reports 2008 and 2009).

The official attrition rate at Grade 3 for the Grade One cohort of 2007-08 is 14% compared to 7% for the cohort ten years before. This suggests that survival rates are declining. When viewed against declining gross enrollment (Table 2.2-2), it suggests that hard won gains in school participation may be eroding and that participation statistics need to be closely monitored even while the attention of the FSM education community has shifted toward quality of instruction and learning.

Student Performance. Although FSM has done well with respect to quantitative indicators of primary school participation, it is doing less well on qualitative indicators of student achievement (Table 2.2-6). It is the goal of the FSM Department of Education to raise all children to competency or above; clearly there is much to be done if this is to be achieved.

Low performance levels in elementary school carry forward to secondary and tertiary schooling. They mean that students leaving school are ill-prepared to take advantage of the opportunities open to them in tertiary education, the U.S. armed forces, U.S. Job Corps training, apprenticeships³⁸ or even the local workforce.

Table 2.2-6. Student Competency SY 2008-2009			
Subject	8th grade students scoring below competence		
	All	Male	Female
Reading	60%	62%	59%
Literature	63%	65%	62%
Whole test	62%	65%	61%
Vernacular ³⁷	No measure available		

Source: FSM Department of Education, JEMCO Report 2009, Indicator 13.

Literacy of Persons 15-24 years of age. The 1980, 1994, and 2000 census surveys collected information about literacy levels defined as 'ability to read and write in any language.' Respondents over the age of 10 were asked if they could read and write a paragraph in any language. A person was considered not to be literate if he/she could read but not write or if writing ability was limited to the person's own name (2000 Census of Population and Housing, Volume II, p. 67).³⁹ As shown (Table 2.2-7) the literacy rate for persons 15-24 years of age is in excess of 90% with the literacy rate for females slightly higher than for males. The apparent decline in literacy for this age group between 1994 and 2000 is a concern. It will be important to assess the 2010 census data to determine if this drop reflects real deterioration in literacy levels.

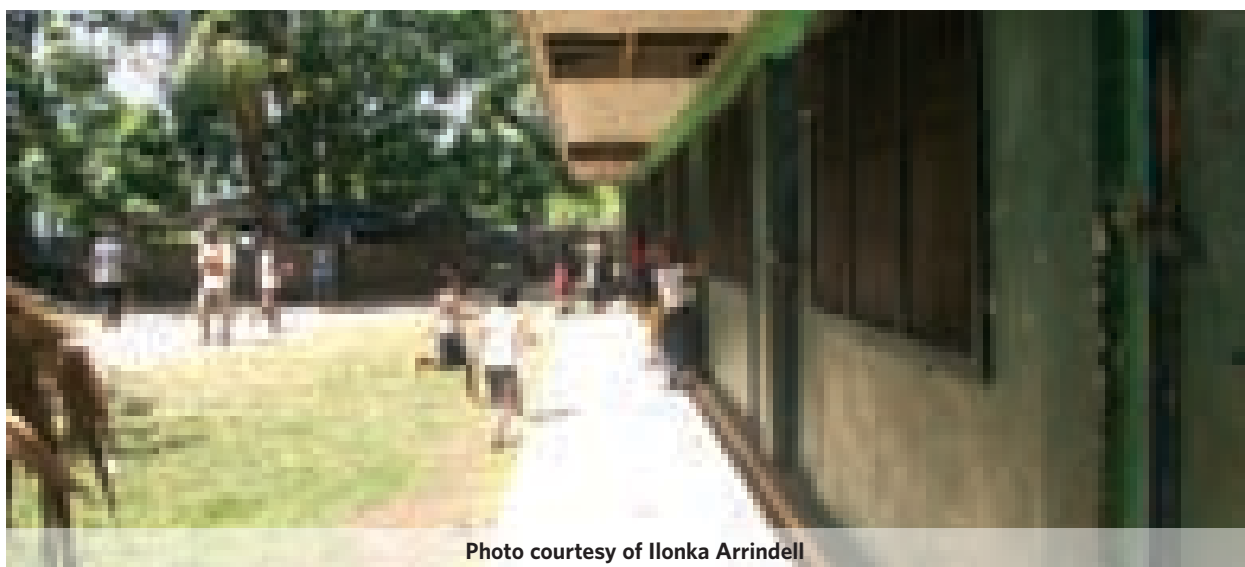


Photo courtesy of Ilonka Arrindell

³⁷ There are 12 major languages spoken in the FSM. While educators and the community alike recognize the importance of students becoming competent in English, there is a general consensus that Micronesian students also need to be competent in their own vernacular language. Instruction in vernacular is a part of all state curricula but is given different weight in different states. While there are no standardized measures of vernacular competency available at this time, it has been suggested during MDG consultations that an indicator be added in relation to vernacular competency and that appropriate measures be developed as part of the local MDG project

³⁸ The U.S. military is undertaking a major build-up in Guam. 10,000 jobs there are reserved for Micronesians (including Palauans and Marshallese) but all require at least basic education skills. Only a small number of FSM students have the necessary skills to avail of this opportunity to escape poverty and acquire trade skills that will earn them a lifelong livelihood either at-home or abroad.

³⁹ UNESCO has criticized this method of determining literacy recommending that survey respondents be asked to actually demonstrate their ability to read and write. Not surprisingly literacy rates tend to fall when based on proficiency assessment. The South Pacific Board of Education Assessment (SBEA) has recently developed a survey instrument and initiated direct measurement of literacy in several Pacific countries. (FSM is not a member of the SBEA). The 2010 FSM census (now in progress) uses for the first time, a direct measure of literacy. These data are not yet available for incorporation herein.

Table 2.2-7. Literacy Rate, 15-24 Year Olds, 1980, 1994, 2000

	15-19 Year Olds			20-24 Year Olds		
	Total	Male	Female	Total	Male	Female
1980	91.6%	91.5%	91.7%	93.1%	93.4%	92.8%
1994	96.3%	96.2%	96.5%	96.5%	96.2%	96.7%
2000	95.4%	94.5%	96.4%	94.7%	93.9%	95.6%

Source: FSM Census of Population and Housing Volume II (2000). Table 8-11, p. 67.

FSM and the Region.⁴⁰ Across the region, countries are making good progress toward MDG 2. By 2007, only PNG and the Marshall Islands had not achieved at least 90% enrollment in primary school. The RMI, however, has accelerated efforts and by 2010 is considered to be “on track” to achieve MDG 2 by 2015. PNG will not achieve the global target but is making good progress toward its own localized target. Like the FSM, countries across the region face the triple challenges of reaching the last 5% of children still outside the education system while improving the quality/relevance of education, and expanding access to secondary schooling.

Standardized test scores across the region show, however, that much work remains before the quality of education can be considered adequate to prepare young people – especially those who will finish school at grade 8 – with the skills needed in the workforce whether domestic or overseas. Increasingly though, a primary education will not be enough to compete even in the domestic job market. More investments will be needed to expand secondary schooling and vocational training. Given the strong negative relationship between schooling and poverty (with higher levels of schooling significantly reducing the risk of poverty), education is a prime anti-poverty strategy relative to MDG 1. A workforce with good basic education and technical skills is also better positioned to attract foreign investment (see MDG 8).

2015 and Beyond. Although there are well recognized deficiencies in the quality of FSM education statistics, Department of Education and census data concur that the FSM has done a good job in achieving high primary school enrollment levels although indications of declining enrollment and increasing attrition are causes for concern. Attrition from grade 5 onward is high nationwide but is especially high in Chuuk and Pohnpei. Gender disparity among girls is a concern in Yap and Kosrae while gender disparity among boys is a concern in Chuuk.

If the FSM is to achieve truly universal primary school participation by 2015 (e.g. enrollment at or above 100%), it will be necessary to maintain past achievements while identifying and addressing

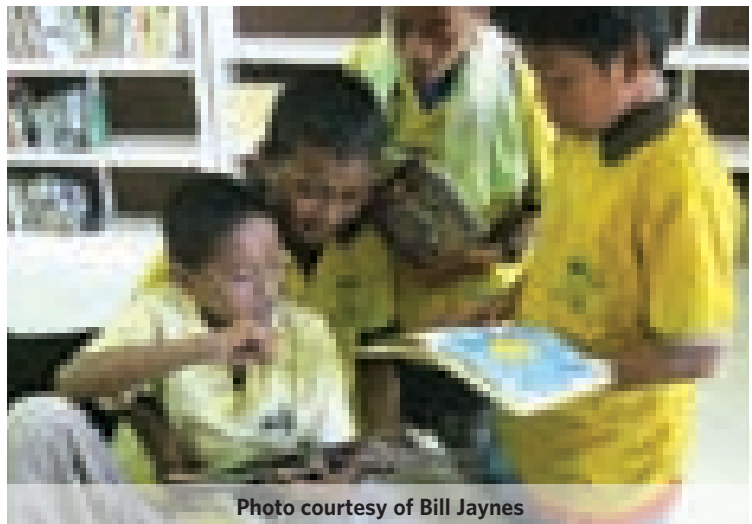
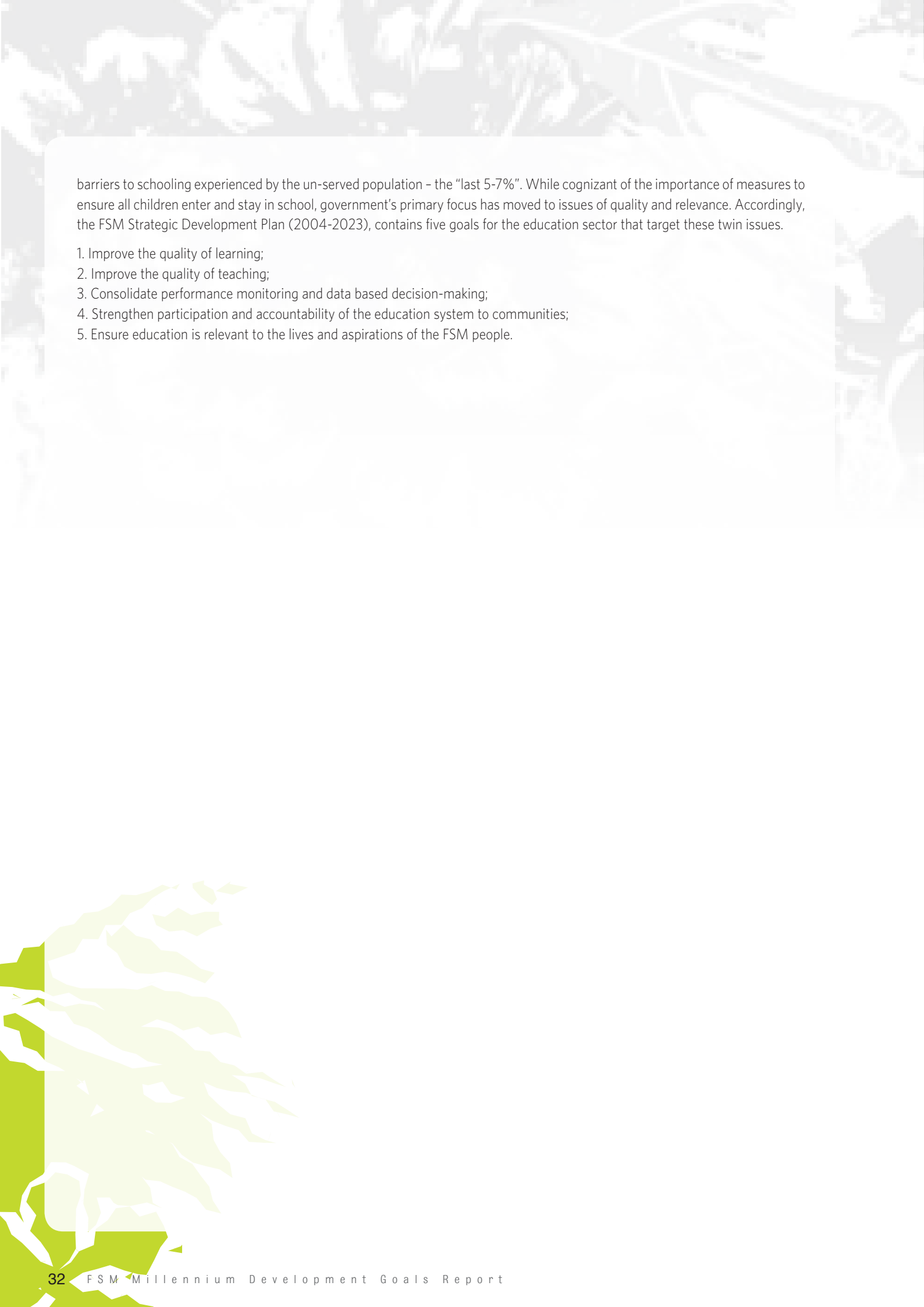


Photo courtesy of Bill Jaynes

⁴⁰ Source of this section is: UNDP-PIFS (June 2010). Cairns Compact Deliverables: 2010 Regional MDG Tracking Report.



barriers to schooling experienced by the un-served population - the “last 5-7%”. While cognizant of the importance of measures to ensure all children enter and stay in school, government's primary focus has moved to issues of quality and relevance. Accordingly, the FSM Strategic Development Plan (2004-2023), contains five goals for the education sector that target these twin issues.

1. Improve the quality of learning;
2. Improve the quality of teaching;
3. Consolidate performance monitoring and data based decision-making;
4. Strengthen participation and accountability of the education system to communities;
5. Ensure education is relevant to the lives and aspirations of the FSM people.



Photo courtesy of FSM Information Services

Millennium Development Goal 3 : Promote Gender Equality and Empower Women

Table 2.3-1. FSM National Indicators at a Glance - MDG 3 Gender

Indicator	Base Data		Most Recent Data		FSM Target	Data Source
	Year	Value	Year	Value		
Target 3-A: Eliminate gender disparity in primary and secondary education, preferably by 2005, and in all levels of education no later than 2015.						
Ratio of girls to boys in primary education	1994	0.92	2009	0.96	1.00+	Census
Ratio of girls to boys in secondary education	1994	0.98	2009	1.02	1.00+	Census
Ratio of girls to boys in tertiary education	1994	0.70	2000	1.07	1.00+	Census
Ratio of female to male enrollment in College of Micronesia	---	---	2009	1.14	1.00+	Dept. of Education
Ratio of women to men in non agriculture wage employment	1994	0.44	2000	0.49	1.0	Census
Ratio of women-to-men earnings (formal employment sector)	1994	0.63	2008	0.87	1.0+	FSM Statistical Year Book
Percent of legislative seats held by women						
- National Congress		0.0%		0.0%	30%	
- Chuuk State	2003	2.6%	2007	2.6%	---	Statistics Division SBOC
- Kosrae State		0.0%		0.0%	---	
- Pohnpei State		4.3%		4.3%	---	
- Yap State		0.0%		0.0%	---	

Section 2.3.

MDG 3. Promote Gender Equality and Empower Women

The Millennium Declaration promotes gender equality and empowerment of women in the interest of human rights and as a strategy for combating poverty, hunger, and disease while facilitating sustainable development. Women's progress toward equality is assessed in three areas: education, employment and politics.

Introduction. The FSM is comprised of several distinct ethnic groups that differ widely in the roles, responsibilities, and status traditionally accorded women. With the exception of Yap and a few outlying atolls in Pohnpei, most ethnic groups are matrilineal (meaning land ownership and use rights and customary titles pass through the female line). Although matrilineal descent has often been cited as according women a higher status than in patrilineal societies, the reality is that matrilineal descent does not guarantee women a voice in decision-making about resources. While inheritance may pass through the female lineage, control over resources is often vested in male members of the lineage.

Overlaying tradition, are the laws and norms of four successive colonial powers and those of the many churches that are deeply rooted in Micronesian society. In general, these external powers have all been patriarchal in orientation; their influence has served to undermine women's status. Transition from subsistence to market oriented economies has also tended to undermine women's status.

Given the wide variation across Micronesia with respect to women's position in society, an in-depth discussion of gender is beyond the scope of this report. Rather, the chapter opens with an overview of the situation of women and continues with an assessment of women's well-being relative to MDG 3 indicators.

Status of Women. The FSM constitution and those of the four states prohibit discrimination on the basis of gender. FSM Article 4.4. states, "Equal protection of the laws may not be denied or impaired on account of sex, race, ancestry, national origin, language, or social status." The anti-discrimination clause is also embedded in the FSM legal code which sets penalties for violation. Despite these legal assurances, women lag behind men in many areas including: health, economic empowerment, and political participation. Women also face special challenges in the areas of reproductive health and domestic violence which limit their ability to fully exercise their constitutional rights. Furthermore, outmigration and social change exacerbated by substance abuse have left many women on their own to manage family affairs and care for children and the elderly with inadequate material resources and weakening support from the kinship system that formerly provided women with protection and a place of refuge during times of hardship (UNICEF, 2004).

The FSM Government has recognized the need to improve the status of women as evidenced by its actions in:

- Ratifying the International Convention on the Rights of the Child (1993);
- Adopting the Pacific Platform for Action on Women (1994);
- Adopting the Cairo Platform for Action on Population and Development (1994);
- Adopting the Global Platform for Action on Women (Beijing, 1995);
- Ratifying the Convention on the Elimination of All Forms of Discrimination against Women (2003).

Government has also taken action in the domestic arena to develop an institutional structure in support of women. The national government created a Women's Interest Office within the Department of Health and Social Affairs (DHSA) in 1993. This office has been subsequently upgraded:

- 1998 to the Women in Development Unit;
- 2000 to the Gender in Development Office
- 2010 to Assistant Secretary, Division of Social Affairs (it is still under review).

State-level Women-in-Development Offices were established in Chuuk, Kosrae, and Pohnpei (1993) and in Yap (2003) together with Women's Advisory Councils. Councils are comprised of representatives of women's organizations (community-based and church-based women's groups, non-traditional organizations, sector-specific groups such as 'women-in-health' and 'women-in-education').⁴¹ They advise the state government and implement their own programs. Chuuk Women's Advisory Council has recently been awarded a \$97,000 grant from Japan to construct a Women's Center. Other international donors are increasingly looking toward women's groups to implement social development projects especially at community levels (personal communications, 2010).

The first FSM National Women's Conference was held in 1992; the second in 1999; and a third in 2010. It is envisaged that future conferences will be held biannually. The next conference has been scheduled for 2012 in Chuuk.

Outputs from the first and second women's conferences influenced the agenda of the 2nd and 3rd FSM Economic Summits (1999 and 2003). The Gender Policy Matrix adopted at the summits has been further refined and integrated into the FSM Strategic Development Plan (2004-2023). The five goals of the matrix are:

- Goal 1: Enhance and promote the cultural, economic, legal, political and social status of women;
- Goal 2: Enhance the leadership capacity and roles for women;
- Goal 3: Mainstream gender Issues into decision-making, policies and strategic development plans;
- Goal 4: Maximize women's participation in democratic and development processes by creating opportunities for women's active involvement;
- Goal 5: Strengthen the institutional capacity of women's programs in FSM.

The government and non-government women's machinery work closely together to advocate for changes in policy and law. Ratification of CEDAW in 2003 was an important strategic milestone for FSM women. Other initiatives are in progress to address women's political representation, domestic violence, and sexual harassment. The law regarding maternity leave was approved on October 16, 2009. It allows paid maternity leave for public employees of the national government for a period of six consecutive weeks per twelve month period (Public Law no. 16-15). Recently legislation introduced into the FSM Congress will create a National Commission on the Status of Women that will, among other activities, monitor implementation of CEDAW.

Political Representation. Legislation has been introduced into the National Congress to propose a constitutional amendment to create reserve seats for women in the Congress (one seat per state thus increasing the Congress from 14 to 18 members). It is envisaged that this will be a Temporary Special Measure (TSM) to jumpstart women's participation in political affairs. Since this action requires an amendment to the constitution, it must be submitted to the public in a referendum. To be approved, a majority of "yes" votes will be required in three of the four states. The measure is somewhat controversial; even some women believe it would be better to fight for election to existing Congressional seats rather than create reserve seats. Despite this sentiment, following extensive discussion at the 2010 Women's Conference, a consensus was reached that women across the FSM will unite together to actively work for this measure.

Table 2.3-2. Legislative Compliance with CEDAW

	FSM National	Chuuk	Kosrae	Pohnpei	Yap	Average
Full compliance	26 (23%)	30 (26%)	33 (29%)	36 (32%)	29 (26%)	154 (27%)
Partial compliance	18 (16%)	21 (19%)	18 (16%)	17 (15%)	16 (14%)	90 (16%)
Out-of compliance	69 (61%)	62 (55%)	62 (55%)	60 (53%)	68 (60%)	321 (57%)
Total # of indicators	113	113	113	113	113	113 X 5

Source: *iknowpolitics.org*. CEDAW Legislative Compliance Review: FSM.

⁴¹ Note that the Chuuk and Kosrae Women's Offices are not currently in operation; their staff and budget was cut as part of public sector retrenchment (FSM DHSA, 2010).

Maternity Leave. In 2009, the national government enacted legislation to allow women employed of the National Government to receive 6 weeks paid maternity leave.⁴² Kosrae State had previously legislated 15 days of paid maternity leave. At the 2010 National Women's Conference it was agreed to work toward uniform maternity leave benefits for all women workers – state and national, public and private.

Domestic Violence. Although the statistical data base is weak, domestic violence is widely believed to be pervasive throughout the FSM. Addressing domestic violence through community education, better policing, and development of support mechanisms for victims is a priority for women at both national and state levels. A draft national domestic violence policy was reviewed at the 2010 Women's Conference preliminary to introduction into Congress. In Pohnpei State, through administrative order, the Justice Department has adopted a “no drop” policy which requires that cases of domestic violence reported to authorities be pursued in court even if the victim requests the case be dropped. This is considered important because many women are coerced by their husbands or families into dropping charges thereby perpetuating a cycle of violence.



Photo courtesy of Ecky Upritchard

Sexual Harassment. A policy to define and address sexual harassment had been drafted for the national government and is being circulated for comments. It is hoped that this and other national policy documents, although applicable only to the small number of women working for the national government, will provide a proactive gender framework that the states can follow.

Women and the Law. Although the FSM law is generally positive in that it does not contain overtly discriminatory provisions, it is at the same time, not proactive in ensuring that women are able to exercise their de facto legal rights. A comprehensive review carried out shortly after the FSM ratified CEDAW found that with respect to 113 internationally recognized indicators of legal compliance, the FSM was fully compliant on 27%, partially compliant on 16%, and out-of-compliance on 57% (Table 2.3-2).

FSM and CEDAW

In the ratification documents, FSM entered four reservations against CEDAW: Article 11(1)(d) which requires the enactment of comparable worth legislation or “equal pay for equal work”; Article 11(2)(b) maternity leave; Articles 2(f), 5, and 16 which relate to the succession of certain traditional titles and to marital customs that divide tasks or decision-making in purely voluntary or consensual private conduct.

- Family law is deficient with respect to age of marriage and age of sexual consent, grounds for divorce, and grounds for awarding child custody and maintenance following marital breakdown;
- There is no affirmative action program to help women redress the accumulated effects of discrimination in education, economic and political life;⁴³
- Although institutional mechanisms for women's development exist in the national government and two of the four states, these mechanisms are under-resourced, under-staffed, and generally marginalized.

Although the identified deficiencies are too numerous to cite here, major weaknesses included:

- Bill of rights does not establish the “highest attainable standard of physical and mental health” as an inherent right;
- Constitution and legal code do not prohibit discrimination on the grounds of marital status, sexual orientation, disability, and HIV status;
- The criminal law is deficient in several respects in its handling of sexual assault and rape;
- There are no specific legal provisions on domestic violence, human trafficking, and sex tourism;

⁴² National government has no authority to enact legislation that affects the employment provisions of employees of state governments and the private sector.

⁴³ The proposed constitutional amendment to create reserve seats for women in congress is an example of affirmative action.

Probably the most far-reaching deficiency, however, is that the constitution allows customary law and tradition to take precedence over codified law even when custom violates the anti-discrimination provisions of the Constitution. This is the basis for the FSM's reservation against CEDAW articles 2(f), 5, and 16 and will undoubtedly be the most difficult of the four reservations to redress.

Women's Health. Gender specific health issues include: high rates of reproductive health problems including complications of pregnancy and inadequate access to comprehensive reproductive health care including contraceptives. Access to reproductive health care and contraceptives is particularly problematic for women living in remote areas (e.g. outer islands) where supplies may be erratic and the only health provider often a male health assistant who may be a relative of a woman seeking services (or relative of her husband), who is constrained by custom from providing reproductive health services. These issues are addressed in greater depth as part of MDG 5 (Maternal Health).

Women are also greatly affected by the increasing prevalence of non-communicable diseases directly (as victims of disease) and indirectly (as caregivers of relatives who are disabled by disease). The virtual epidemic of NCDs sweeping the FSM is rooted in unhealthy lifestyles including poor diet, low levels of physical activity, and exposure to tobacco and alcohol (see MDG 6).

Although Micronesian women have a slightly longer life expectancy than men (67 years for women; 66 years for men), the differential is lower than that seen in countries where women do not face high levels of reproductive health related mortality (2005 Census of Population and Housing, Volume II Analytic Report, Chapters 4 & 5, pp. 25-47).

Target 3-A. Gender Equality and Empowerment

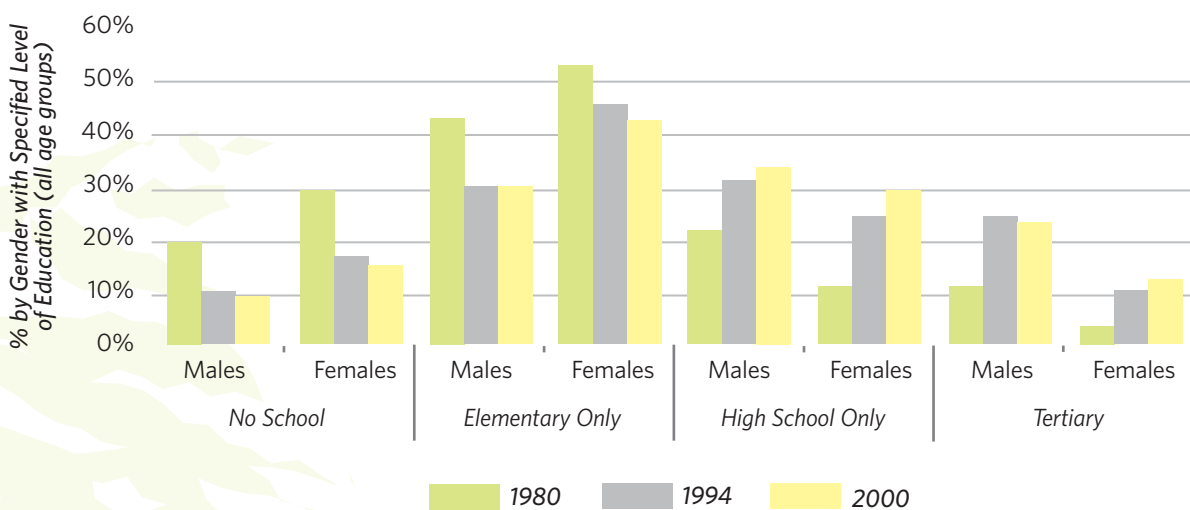
Eliminate gender disparity in primary and secondary education, preferably by 2005, and in all levels of education no later than 2015.

Women and MDG 3. MDG 3 has one target and three indicators addressing women's participation in education, the labor force, and politics.

Women and Education. Until recently girls-women were under-represented in schools. This resulted in a pronounced

gender gap in educational attainment. By 1980, however, the gender gap had narrowed and by 2000 had all but disappeared with the exception of Yap (Figure 2.3-1, Table 2.3-3, see also gender discussion under MDG 2).

Figure 3.1. Educational Attainment by Gender, 1980-2000
Source: 2000 Census of Population and Housing, Volume II



Women and Literacy. Reflecting historic gender bias against women in education, total literacy rates are lower for women than for men. By 2000, however, women under 30 had higher literacy levels than men although men continue to surpass women for age groups over 30 (Table 2.3-4, page following). The decline in literacy for both sexes in the 10-24 age groups is of concern, especially in light of statistics that suggest declining school participation rates and increasing attrition for both sexes (see MDG 2).

Women in the Labor Force: The MDG indicator for women in the labor force is the proportion of the women in non-agriculture wage employment.⁴⁴ The number of women in the labor force (including agriculture) nearly doubled between 1994 and 2000 in comparison to a more modest increase for men. Most of this increase, however, occurred in the non-formal (agriculture-fisheries) sector. Women's participation rate in the wage and salary sector actually declined slightly (by -0.4%) although the decline was less than for men (-3.9%). Unemployment levels for women were very high in 1994 - nearly double those for men. In 2000, women's unemployment levels remained high (nearly 1 in 4 workers) but men's unemployment had doubled so that the two then had similar rates.

Table 2.3-3. Ratio of Females-to-Males in Schools
SY 2008-09, FSM Dept. of Education, 2010

	Elementary	Secondary	College of Micronesia
Nat'l	0.96	1.02	1.14
Chuuk	0.97	1.09	1.31
Kosrae	1.00	0.99	0.64
Pohnpei	0.96	1.02	1.12
Yap	0.90	0.83	1.20

Deteriorating employment prospects for both men and women between 1994 and 2000 reflects public sector retrenchment without comparable private sector growth. Due to lack of alternatives, it appears that more people - especially women - are turning to subsistence production (agriculture and fisheries) for their livelihood.

Data from the 2000 census show that for every two men employed in the wage and salary sector, there was only one woman employed. Causes of this differential include traditional ideas about the roles of women, historic limitations on women's participation in education, lack of control by women over land and other productive resources, and difficulty women face in accessing credit.⁴⁵ The FSM Strategic Development Plan acknowledges that women have limited opportunities to exert "power and influence over economic processes and structure." The plan notes that women are virtually absent in economic decision

Table 2.3-4. Age and Gender Specific Literacy Levels, 1980, 1994, 2000

	1980		1994		2000	
	Male	Female	Male	Female	Male	Female
10-14	87.3	87.6	92.2	94.3	89.6	92.1
15-19	91.5	91.7	96.2	96.5	94.5	96.4
20-24	93.4	92.8	96.2	96.7	93.9	95.6
25-29	93.4	92.3	96.3	96.2	94.3	94.6
30-34	94.1	88.9	97.2	95.9	94.6	94.0
35-44	92.9	85.6	97.1	94.5	95.2	94.7
45-54	89.2	82.2	95.7	88.2	95.7	89.1
55-59	87.1	80.3	93.5	82.8	93.2	81.8
60-64	84.7	79.1	87.8	79.0	86.5	77.3
65-74	83.4	73.6	85.7	75.7	81.8	71.2
75+	73.7	70.7	82.7	70.4	82.0	67.1
All Ages	90.3	87.6	94.8	93.0	92.9	91.9

Source: 2000 Census of Population and Housing, Volume II, Table 8.11, page 67.

⁴⁴ The FSM defines the labor force as all persons 15 years of age and over.

⁴⁵ Note that some commentators have challenged the conclusion that lower labor force participation indicates gender discrimination but rather argue that this represents a choice that many women exercise after marriage and childbirth. Note also there are unconfirmed reports that FSM credit institutions require that husbands co-sign loans for their wives but without reciprocal requirements for wives to co-sign loans for their husbands (Draft Gender Stocktake, 2010).

making (formulation of financial, monetary, commercial, tax, compensation, and related economic policies) and their economic contributions are often ignored (FSM Strategic Development Plan 2003-2004, Volume I). Women however are making inroads into this traditional male bastion. Women have recently been appointed to the Social Security, Banking, and Health Boards. In the private sector, Women in Business organization has also been created.

Women's Earnings. Although the MDGs set no target relating to equality of earnings, by extension the MDGs would embrace "equal pay for equal work." Data clearly show that FSM women do not receive "equal pay for equal work" (Table 2.3-6). In the private sector, the median income for women is \$3,190 and for men, \$4,075. Even in the national government, where equality of earnings might be expected, the median income for women is \$9,572 and for men, \$11,240. Across all occupational categories women earn on average \$0.87 for every \$1.00 earned by men but the ratio ranges from 0.50 (craft workers) to 0.98 (executives and managers). Only among subsistence workers is the median income the same for both genders (Table 2.3-6).

Table 2.3-5. Labor Force Status by Gender, 1994 & 2000

	1994		2000	
	Male	Female	Male	Female
Potential labor force (persons 15+)	30,127	29,446	31,821	32,015
In labor force	17,098 (56.8%)	8,874 (30.1%)	21,376 (67.2%)	16,038 ^a (50.1%)
In formal sector (non-agriculture) labor force	10,016 (33.3%)	4,365 (14.8%)	9,343 (29.4%)	4,616 (14.4%)
Unemployed	10.7%	26.9%	20.7%	23.8%

Source: 2000 Census of Population and Housing, Volume 1, Tables 9.4 and 9.6.

Table 2.3-6. Median Income by Gender, 1999

Source: 2000 Census and 2008 FSM Statistical Yearbook

	Median Income		Ratio of female to male earnings
	Male	Female	
Employment Setting			
Private for profit	\$4,075	\$3,190	0.78
State government	\$6,150	\$5,688	0.92
National government	\$11,240	\$9,572	0.85
Self-employed	\$6,691	\$4,926	0.74
Occupation			
All occupation groups	\$4,841	\$4,235	0.87
Executives & managers	\$9,721	\$9,519	0.98
Professionals	\$7,139	\$5,944	0.83
Technicians	\$6,669	\$6,160	0.92
Administrative support	\$4,386	\$4,247	0.97
Service workers	\$3,452	\$2,978	0.86
Agriculture & fishing	\$4,356	\$3,750	0.86
Subsistence workers	\$4,375	\$4,375	1.00
Craft & related workers	\$4,183	\$2,103	0.50
Machine operators	\$3,922	\$2,813	0.72
Laborers	\$3,473	\$2,600	0.75

Source: 2000 FSM Census (Table 11.10) and 2008 FSM Statistical Yearbook, (Table 4.14).



Photo courtesy of FSM Information Services

Women in Politics. The MDG indicator for women in politics is legislative seats held by women as a proportion of total seats. At the national level, the FSM Congress has 14 seats; none have ever been filled by a woman.⁴⁶ Women have not fared much better at the state level; women are represented only in Chuuk and Pohnpei state legislatures. Women fare slightly better in the Executive Branch of government and hold (or formerly held) several cabinet-level positions and directorships including the following (in 2010):

- National cabinet - 2 women
- Chuuk cabinet - 1 woman
- Kosrae cabinet - 0 women
- Pohnpei cabinet - 2 women
- Yap cabinet - 2 women

The FSM Strategic Development Plan notes that “persistent cultural and traditional values and practices hinder women’s active participation in power and decision-making processes and structures.”

FSM and the Region. With the exception of Papua New Guinea and the Solomon Islands, all Pacific Island countries are expected to achieve gender equality in primary education by 2015. Several Polynesian and Micronesian countries, including the FSM, are on track to achieve gender equality in secondary and tertiary education as well.

The situation of women in the workforce in the FSM is fairly typical around the region. Women are under-represented in

the wage and salary sector workforce (range 30-58% participation rates) with rural women at special disadvantage. Across the region, women face significant discrimination in terms of wages and opportunities for advancement and are disproportionately represented in the ranks of the unemployed.

In the political arena, the FSM situation is also fairly typical. Across the region, only 12% of seats in national parliaments/congresses are held by women. If only independent Pacific Island nations are considered, this proportion falls to a mere 5.8%. The poor track record in the region is sparking more serious consideration of affirmative actions to catapult women into leadership positions. The proposed FSM measure to reserve Congressional seats for women is one example.

Domestic violence, which until recently was seldom discussed and almost no where is accurately measured, appears to be pervasive across most of the Pacific region even in countries where the status of women is generally considered to be good. Domestic violence is a continuing drain on women’s health and energies that erodes their self-esteem and contributes to low levels of participation in the labor force and politics.

⁴⁶ According to UNDP (2010), FSM is one of only three countries in the world that has never elected a woman to a seat in the national legislative body.

2015 and Beyond. There was widespread agreement among participants in the FSM Participatory Hardship Assessment (ADB, 2004) that despite many challenges, the situation of women in the FSM has improved over the past decade. This is attributed to increased access to education, better organization by women themselves, increasing community recognition of women's contributions, and political appointment of women to senior government positions. There is also a perception that men are now giving women a greater level of responsibility for decision making in the home (Abbott, 2004, paragraph 98).

Ratification of CEDAW has certainly worked to raise the profile of women in national life. Several very important measures have been taken subsequently to boost women's participation in economic and political life. The creation of a National Commission on the Status of Women and efforts to strengthen women's machinery in the national and state governments also bode well for future progress toward equality and empowerment. The most promising development, however, is the virtual elimination of the gender gap in education. While educated women may continue to face social barriers, by virtue of their education, they will be better positioned to overcome these barriers and if necessary, create their own opportunities whether in business, politics, or community life.

In the public policy arena, the current national government leadership is taking a proactive stance in advancing the status of women. The proposal to create reserve seats for women in the Congress did not originate in the women's machinery but from the floor of the Congress. The national government, however, can advocate for advancement of women but has limited Constitutional power to influence state government policies and laws that actually make a difference in the lives of women. State governments are in general not as proactive as the national government in addressing gender issues and women's equality.



Photo courtesy of Ecky Upritchard



Photo courtesy of FSM Information Services

Millennium Development Goal 4 : Reduce Child Mortality

Table 2.4-1. FSM National Indicators at a Glance - MDG 4 CHILD MORTALITY

Indicator	Base Data		Most Recent Data		FSM Target	Data Source
	Year	Value	Year	Value		
Target 4.A: Between 1990 and 2015, reduce infant and under-five mortality by two-thirds						
Infant mortality rates (deaths among infants under 1 year of age per 1,000 live births)	1990	46	1996	40	15	Census
	1999	19.5	2009	13	12	Civil registration
Under 5 mortality (deaths among children 0-59 months of age per 1,000 live births)	1990	62	1996	52	17.2	Census
	1990	NAv	2009	16	NAv	Civil registration
Children immunized against measles (% one year olds)	1999	79%	2008	85%	90%	DHSA (Family Health)
Fully immunized (% children 2 years of age)	1999	74%	2009	64%	90%	DHSA (Family Health)
Infants (%) exclusively breastfeeding at hospital discharge	1999	100%	2004	94%	100%	DHSA (Family Health)
Infants (%) breastfeeding at six months of age (new indicator recommended by 2010 WHO General Assembly)	1999	100%	2009	73%	100%	DHSA (Family Health)

Section 2.4.

MDG 4 - Reduce Child Mortality

Introduction. MDG 4 has one target – reduce infant and under-five child mortality. The target is supported by three indicators:

- Infant mortality rate (deaths among children 0-364 days of age per 1,000 live births);
- Under-five child mortality rate (deaths among children 0-4 years of age per 1,000 live births);
- Proportion of one-year old children immunized against measles.

In May 2010, the World Health Assembly recommended that a fourth indicator be added - infants exclusively breastfed until 6 months of age. Although not yet an official MDG indicator, data relative to this proposed indicator is included herein. It should be noted, however, that FSM data do not differentiate between exclusive and non-exclusive breastfeeding (personal communications, 2010).⁴⁷

MDG Target 4-A. Infant & Child Deaths

Global: Between 1990 and 2015, reduce infant and under-five child mortality (IMR and U5MR) by two thirds.

FSM: Between 1990 and 2015, reduce infant mortality rates from 46 to 15; reduce U5MR from 62 to 21.⁴⁸

Infant Mortality Rate. Indirect measures of IMR are available from the census (Table 2.4-2). Census data are particularly helpful for discerning trends where civil registration (births and deaths reported to health authorities) is incomplete as has historically been the case in the FSM.

Direct measures of IMR are available from civil registration as shown in Table 2.4-3. Civil registration has historically under-reported births and deaths in the FSM. Over the past decade,

however, the FSM Department of Health and Social Affairs (DHSA) notes that the completeness and accuracy of civil registration data have improved and recommends that civil registration data be used to gauge national progress toward MDG 4. Close examination of the data, however, suggests that IMR continue to be at least somewhat under-reported. As one example, IMR rates for Pohnpei (ranging from 2-13 deaths per 1,000 live births for the period 2000-2009) are unrealistically low in view of: (a) global figures since IMR in this range is generally associated with highly developed countries and (b) other complementary maternal and child health indicators for Pohnpei. The accuracy of rates based on civil registration cannot be verified until 2010 census data have been tabulated (estimated completion by mid-2011). At that time, it may be necessary to revise projections herein and revise conclusions about the FSM's progress toward the IMR target.

Besides under-reporting, analysis of IMR is complicated by the small number of vital events occurring in the FSM (and other countries with populations under 250,000). Small numbers cause rates to fluctuate widely from year-to-year making it difficult to discern underlying trends. In order to determine FSM's status vis-à-vis the IMR indicator, rates have been calculated on the basis of three-year moving averages as this helps to minimize annual fluctuations. Projections to 2015 have been made on the basis of logarithmic trends calculated on the basis of 1999-2009 data (Figures 2.4-1 and 2.4-2).

Table 2.4-2. IMR Derived from Census Reports

Census Year	IMR Year	IMR
1973	1969	68
1980	1976	48
1994	1990	46
2000	1996	40

⁴⁷ Exclusive breastfeeding means that no complementary foods or drinks are given to the infant. Non-exclusive breastfeeding means that the infant receives breast-milk along with other foods and drinks. WHO and UNICEF recommend exclusive breastfeeding throughout the first 6 months of life.

⁴⁸ Infant mortality rate is the probability of a child dying during the first year of life (0-364 days) expressed per 1,000 live births. U5MR is the probability of a child dying during the first five years of life (0-4 years of age) expressed per 1,000 live births.

To be on-track to achieve IMR targets using civil registration data, the logarithmic trend for 2013-2015 should be around 12. The projected logarithmic trend based on 1999-2009 data is 15 (Figure 2.4-1). This means that the FSM is off-track to achieve the IMR target. When data are examined for each of the four states (Figure 2.4-2), it is found:

- Chuuk is off-track for achieving the target;
- Yap is seriously off-track with reported IMR there is actually increasing instead of declining;
- Pohnpei is on-track but as noted, there is a high probability that IMR there is underreported for most years of the 1999-2009 data series;
- Kosrae, the smallest state, is the only state that is fully on-track to achieve IMR targets.

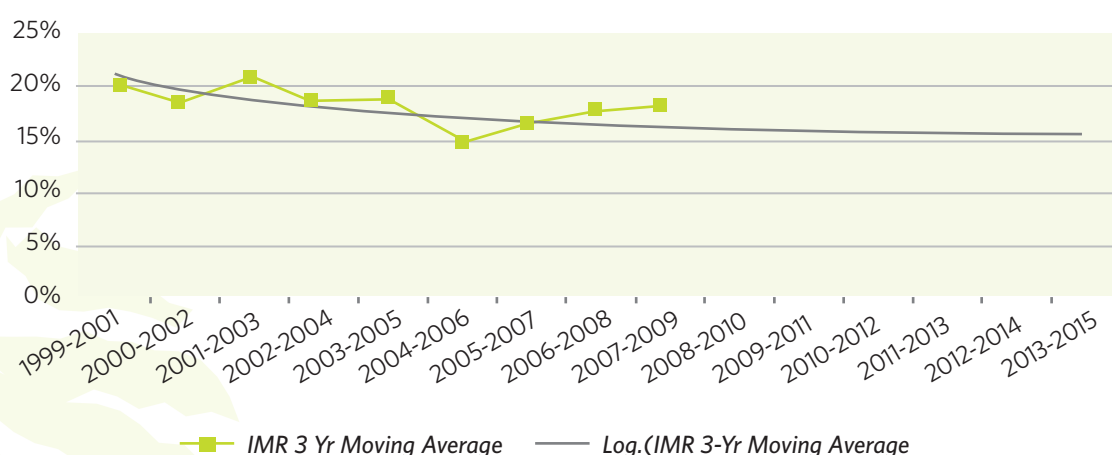
Nationwide, neonatal deaths (deaths occurring in the first 28 days of life) account for 72% of infant deaths (FSM DHSA, 2010). This proportion is similar in Chuuk (65%), Kosrae (70%), and Pohnpei (68%). Only in Yap (53%) does the proportion deviate significantly. A preponderance of neonatal deaths is indicative of a need to improve maternal health, prenatal and obstetric care.

Year	Nat'l	Chuuk	Kosrae	Pohnpei	Yap
1999	19.5	18.9	31.7	20.5	8.2
2000	17.7	25.7	9.6	5.0	26.7
2001	21.8	35.5	15.2	6.2	26.8
2002	15.8	24.6	24.0	7.5	7.3
2003	22.6	22.2	38.0	3.1	27.0
2004	17.5	18.0	12.0	13.0	27.0
2005	16.0	22.0	5.0	10.0	19.0
2006	11.2	18.0	14.0	2.0	18.0
2007	20.6	28.0	0.0	11.0	33.0
2008	17.0	30.0	19.0	4.3	24.0
2009	13.0	18.6	22.9	4.0	17.0

Source: FSM Department of Health and Social Affairs, MCH data base, June 2010.

Under Five Child Mortality. The U5MR statistic was developed in the 1980's to be a more sensitive indicator of living conditions and adequacy of child health services since young children are particularly susceptible to diseases rooted in poverty - diarrheal diseases associated with poor water, sanitation, and hygiene; respiratory diseases associated with poor living conditions, overcrowding; malnutrition; and other parasitic and infectious diseases.

Figure 2.4.1. FSM Infant Mortality Rate 1999-2015
(3 year moving average based on civil registration data 1999-2009 with logarithmic projection to 2015)



In contrast to IMR, the U5MR statistic is less well known in the FSM and there appears to be confusion among health managers and statisticians about the difference between U5MR and child mortality rate. (The child mortality rate is expressed as the number of child deaths between 1 and 4 years of age per 1,000 children). Although the raw data exists to calculate U5MR, the statistic is not routinely produced. Because the U.S. Department of Health and Human Service - an agency that provides large amounts of funding for the maternal and child health programs in the FSM - monitors the death rate for children 1-14 years of age. It is this rate that the FSM routinely calculates and publishes (Table 2.4-4).

Figure 2.4-2A. Kosrae

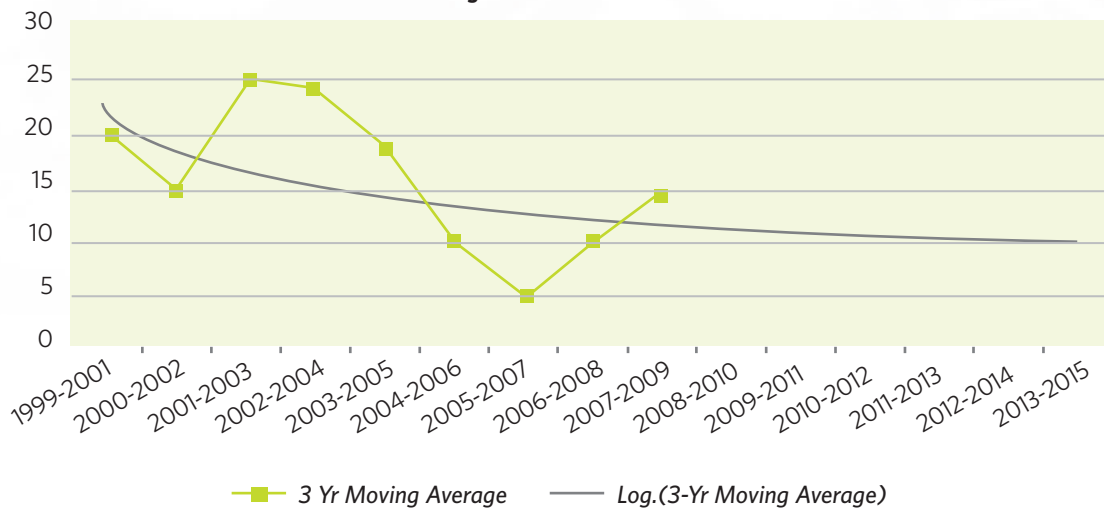
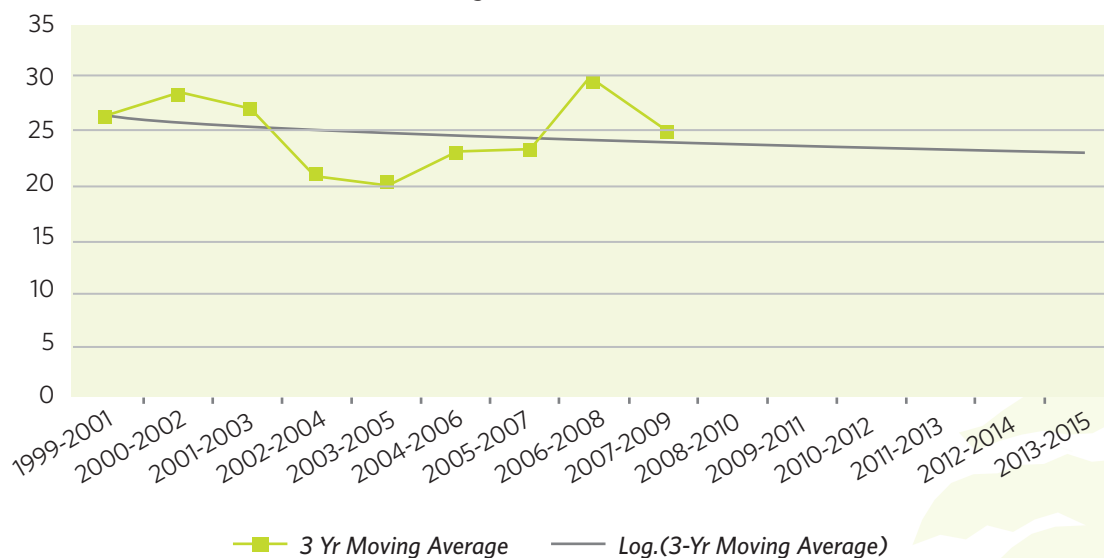
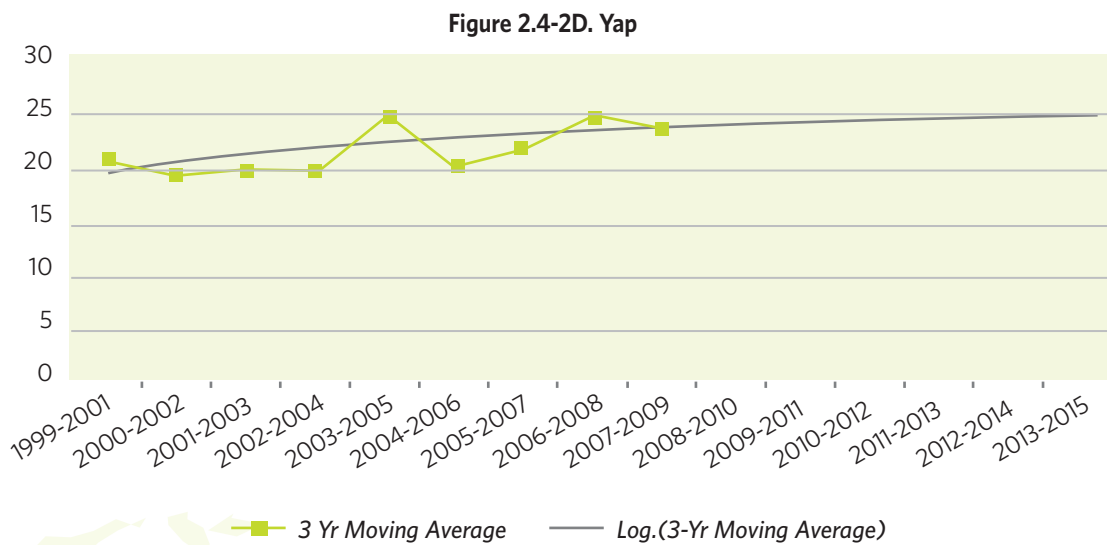
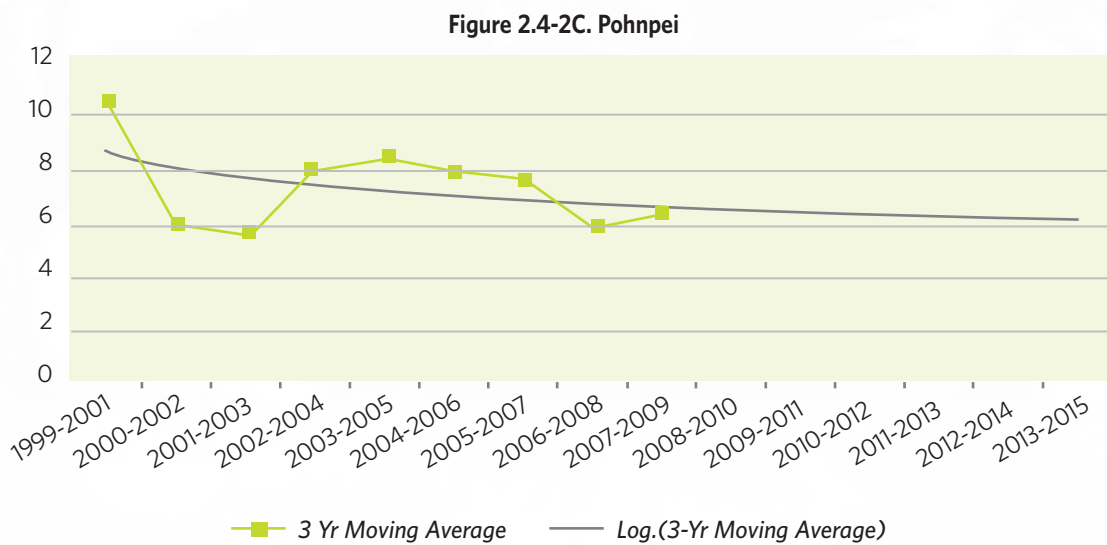


Figure 2.4-2B. Chuuk





Although not routinely used or reported, indirect measures of U5MR are available from the census (Table 2.4-5).

Direct measures of U5MR are available from civil registration (16.7 deaths per 1,000 live births, 2010). Reported U5MR deaths, however, are primarily in-hospital deaths. Child deaths occurring in the community are believed to often go un-reported (DHSA, personal communications, 2010).

Causes of Death. The most common causes of death in the neonatal period are prematurity and congenital anomalies. The most common cause of post-neonatal death, (29 days to 364 days of life), is an acute infection complicated by poor nutrition (Table 2.4-6). Additional insight into child health comes from a 2007 review of pediatric hospital admissions carried out the FSM DHSA. The review found that across all four states, the five top reasons for admission were: respiratory illnesses (mainly bronchiolitis and pneumonia); gastrointestinal diseases (diarrhea with or without dehydration, malnutrition, and parasitism); skin infections (scabies and impetigo); injury (motor vehicle accidents); and abscesses (deep muscle and cellulitis). Most of these hospitalizations could be avoided with early care of precursor conditions provided in the community.

Immunization. Because early childhood immunization requires a well-organized primary health care system, a population receptive to seeking and receiving health services, and repeated contacts between health workers and children during the early months of life when children are most vulnerable, immunization levels have been identified by UNICEF and WHO as key indicators of the quality of child health services. In many

Table 2.4-5. U5R Derived from Census Reports

Census Year	U5MR Year	U5MR
1973	1969	95
1980	1976	65
1994	1990	62
2000	1996	52

Table 2.4-4. Death Rate for Children 1-14 Years of Age (Deaths per 100,000 children)

Year	Nat'l	Chuuk	Kosrae	Pohnpei	Yap
1999	30.3	24.5	74.7	29.8	24.4
2000	60.2	49.1	0.0	124.6	24.7
2001	77.1	82.8	70.0	76.9	52.5
2002	28.1	5.0	0.0	28.5	78.7
2003	117.0	199.7	70.0	14.3	184.0
2004	76.1	73.0	175.0	30.5	0.0
2005	114.2	156.0	105.0	76.4	97.0
2006	67.0	80.0	154.0	40.6	24.0
2007	151.1	245.0	186.0	32.2	49.0
2008	46.3	58.0	37.0	15.1	97.0
2009	35.9	65.0	74.3	0.0	0.0
Average	73.0	94.4	86.0	42.6	57.4

Source: FSM Department of Health and Social Affairs, MCH data base, June 2010.

Table 2.4-6. Causes of Infant and Child Mortality, 1990-2003

Under 1 Year of Age	Rate Per 100,000	Deaths 1-4 Years of Age	Rate Per 100,000	Deaths 5-14 Years of Age	Rate Per 100,000
Pneumonia-Influenza	165	Unintentional Injury	21	Unintentional Injury	12.5
Septicemia	70	Pneumonia - Influenza	15	Suicide	4.4
Diarrhea	41	Diarrhea	12	Heart Disease	4
Unintentional injury	24	Cancer	3	Pneumonia - Influenza	3
Heart disease	19	Tuberculosis	2	Tuberculosis	1

FSM Department of Health, Fu Hua, WHO-FSM Consultant.

countries, measles is the last vaccine administered in the primary infant-toddler series making measles coverage a particularly sensitive indicator of primary health care quality, access, and continuity. It is for these reasons that measles vaccination levels have been selected as an MDG indicator.

In countries that follow the WHO-recommended immunization schedule, measles vaccine is administered to infants between the ages of 9-12 months. The FSM, however, follows a modified version of the U.S. vaccination schedule that uses MMR (measles, mumps, and rubella) vaccine administered in 2 doses, one at 12 months of age and one during the second year of life. The FSM statistic that corresponds most closely with the MDG indicator is "proportion of one-year old children receiving MMR-1." The statistic, however, that FSM monitors most closely is "proportion of two year old children who are fully immunized".⁴⁹



Photo courtesy of Carter J. Apaisam

Immunization rates fluctuate from year to year especially in the State of Chuuk. Nationwide, however, MMR coverage at one year of age is generally at or close to the MDG target. FSM, however, is not consistently achieving its own domestic target of 90% of children completing all immunizations by or before two years of age (Table 2.4-7).

Table 2.4-7. Progress Toward Immunization Targets

(a) Measles vaccine at 1 year of age and (b) Fully immunized at two years of age

Year	Children 1 Year of Age Receiving MMR-1	Two Year Old Children Completing all Immunizations				
		FSM	Chuuk	Kosrae	Pohnpei	Yap
1999	79%	74.0%	70.0%	80.0%	55.0%	91.0%
2000	84%	70.0%	54.2%	92.2%	48.0%	86.6%
2001	86%	71.8%	56.0%	94.0%	62.3%	75.3%
2002	91%	78.9%	54.6%	95.0%	77.0%	88.0%
2003	87%	80.3%	61.0%	96.0%	77.0%	87.0%
2004	96%	83.1%	80.0%	98.0%	75.1%	79.0%
2005	98%	82.5%	93.0%	90.0%	82.8%	74.0%
2006	85%	66.0%	54.0%	79.0%	81.4%	89.0%
2007	86%	68.8%	50.0%	99.0%	80.0%	94.0%
2008	93%	63.4%	57.9%	100.0%	53.7%	98.0%
2009	91%	67.8%	65.6%	97.0%	58.0%	84.0%

Source: FSM Department of Health and Social Affairs (Family Health Unit)

⁴⁹"Universal" immunization is generally defined as 90% coverage levels or above.

Breastfeeding. Children who are breastfed have higher survival rates and are less susceptible to illness and under-nutrition. There is also growing evidence that children who are breastfed are less susceptible to overweight and non-communicable diseases not only during childhood but throughout their lives. WHO recommends that all infants be exclusively breastfed for the first six months of life and that breastfeeding continue with complementary feeding through at least the first year of life and preferably into the second year of life. FSM has adopted WHO recommendations as national policy. The national government has enacted legislation to implement the International Code on Marketing of Breastmilk Substitutes and both national and state health departments strive to promote breastfeeding in antenatal clinics and on obstetrics units. Pohnpei Hospital is the only hospital in the Micronesia Region that has been certified by WHO as a “baby friendly” hospital meaning that it complies with 10 internationally recognized measures for promoting breastfeeding in health facilities. Among these measures is a ban on bottles and teats in obstetric units (unless medically indicated and prescribed by a physician). The other three FSM hospitals

Table 2.4-8. Infants Breastfed at 6 Months of Age

(Note: Infants receiving breastmilk; does not measure exclusive breastfeeding)

Year	Nat'l	Chuuk	Kosrae	Pohnpei	Yap
1999	100.0%	100.0%	100.0%	100.0%	100.0%
2000	100.0%	100.0%	99.0%	100.0%	100.0%
2001	99.3%	100.0%	100.0%	100.0%	92.9%
2002	93.2%	100.0%	99.0%	100.0%	74.0%
2003	84.0%	100.0%	99.0%	100.0%	37.0%
2004	93.7%	100.0%	99.0%	100.0%	76.0%
2005	100.0%	100.0%	100.0%	51.0%	26.0%
2006	73.0%	84.0%	67.0%	44.0%	100.0%
2007	74.9%	90.0%	78.0%	78.9%	35.0%
2008	73.2%	86.0%	73.0%	49.0%	54.0%
2009	73.4%	90.0%	65.7%	53.4%	52.0%

Source: FSM Department of Health and Social Affairs, MCH data base, June 2010.

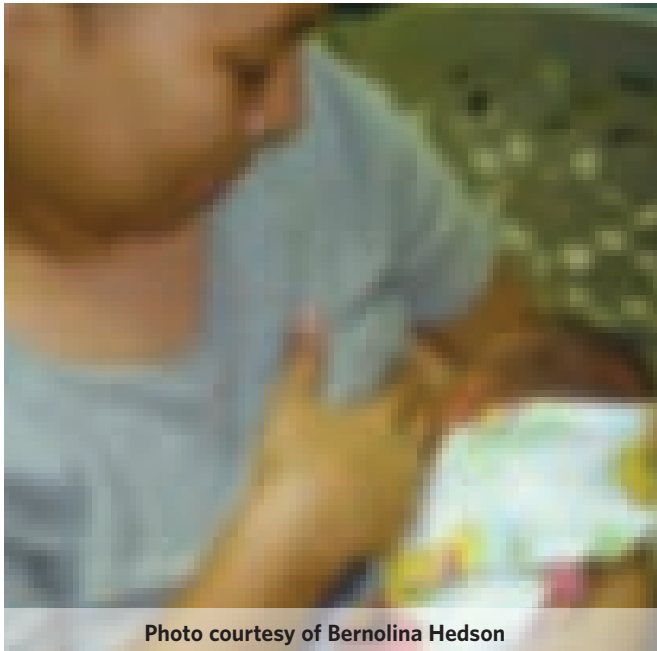



Photo courtesy of Bernolina Hedson

actively promote breastfeeding and restrict use of bottles and teats but have not yet been internationally certified. For in-hospital deliveries mothers and infants are generally not discharged until breastfeeding is well established; virtually 100% of infants are exclusively breastfeeding at discharge. The rate, however, drops post-discharge. In 2009, 73% of six month old infants were still receiving breastmilk ranging from a low of 52% in Yap to a high of 90% in Chuuk (Table 2.4-8).

FSM and the Pacific Islands. In general the Pacific Region is performing well in relation to MDG 4 with seven countries on track to achieving the two-thirds reduction target. PNG is the only country seriously off-track against the global target but is making progress toward a lower national target. On the immunization indicator, only four countries have not met or exceeded the 90% benchmark that is generally accepted as tantamount to “universal” coverage.



To assist countries in achieving MDG 4, WHO and UNICEF are increasing support to Expanded Programs of Immunization (EPI) and the Integrated Management of Childhood Illnesses. In the FSM, the Integrated Program was launched in 2006 with the goal of upgrading the skills of primary health care workers in caring for sick children and insuring that essential drugs are available in all health care sites to manage the most common childhood illnesses. This program was launched in Chuuk and will eventually be extended to the other states.

2015 and Onward. Based on civil registration data, the FSM is off track to achieve MDG 4 but is not so far off track that the target could not be achieved in the five years remaining before 2015. Special efforts are needed to assist Chuuk and Yap to get “on target”. In Chuuk, where neonatal deaths predominate, improvements in maternal health, antenatal and obstetric care are likely to be the fastest way to drop mortality rates. In Yap, where there are still large numbers of post-neonatal deaths, improvements in the early recognition and treatment in the community of common childhood illnesses (especially respiratory illnesses that are the leading cause of child death) are likely to generate the fastest results.



Photo courtesy of FSM Visitors Board

Millennium Development Goal 5 : Improve Maternal Health

Table 2.5-1. FSM National Indicators at a Glance - MDG 5 Maternal Health						
Indicator	Base Data		Most Recent Data		2015	Data Source
	Year	Value	Year	Value	FSM Target	
Target 5-A: Between 1990 and 2015, reduce maternal mortality by three-quarters.						
Maternal mortality ratio (maternal deaths per 100,000 live births)	1994	224	2009	0	56	DHSA
Births (%) attended by skilled personnel	1998	93%	2008	90%	100%	Statistical Year-book 2008 & FSM DHSA
Target 5-B. By 2015, achieve universal access to reproductive health services.						
Contraceptive prevalence rate (women 15-49 years of age using modern family planning methods)	1990	45%	2009	40%	---	DHSA
Adolescent birth rate (births to women 15-19 years of age per 1,000 women 15-19 years of age)	1990	90	2008	41.5	---	Census (1990); DHSA (2008)
Births (%) preceded by at least one antenatal visit	1999	9.7%-	2009	34.7%	100%	FSM DHSA (Family Health Unit)
Births (%) preceded by at least 4 antenatal visits	---	NAv	---	NAv	100%	
Births (%) preceded by antenatal care scoring at least 80% on the Kotelchuk Index	1999	44%	2009	60%	100%	
Unmet need for family planning services (sexually active women not using contraception who do not want children at this time)	No Data				0%	---

Off-Track but
data weak due to
small numbers

Section 2.5.

MDG 5. Improve Maternal Health

Introduction. The theme of a recent international media campaign – “no woman should die in giving life” – MDG 5 reflects a global consensus that the time has come for the world to put an end to maternal deaths. Accordingly, MDG 5 has two targets: reduce maternal mortality and ensure universal access to reproductive health services. The targets are supported by six indicators.

MDG 5-A has two indicators: maternal mortality ratio and births attended by skilled health personnel.

Maternal Mortality Ratio. WHO defines a maternal death as, “the death of a woman while pregnant or within 42 days of termination of pregnancy, irrespective of the duration and site of the pregnancy, from any cause related to or aggravated by the pregnancy or its management but not from accidental or incidental causes” (WHO, 2010). The maternal mortality ratio (MMR) is calculated as maternal deaths (numerator) per 100,000 live births (denominator).

$$\text{maternal} \frac{\text{deaths}}{\text{livebirths}} \star 100,000 = \text{MMR}$$

The situation with respect to MMR in the FSM is somewhat unclear. Similar to the situation in many countries, reported deaths are primarily those that occur in health facilities; deaths occurring in the community may not be reported or if reported, may not be classified as a maternal death if the immediate cause of death is not obviously related to pregnancy or

delivery. Like other small countries including all Pacific nations except PNG, a denominator of 100,000 is not appropriate in light of the small number of births. One additional death in a year can change the FSM MMR by 50 points. In small populations, it is more accurate to assess trends on the basis of actual number of reported deaths rather than rates (Table 2.5-2).

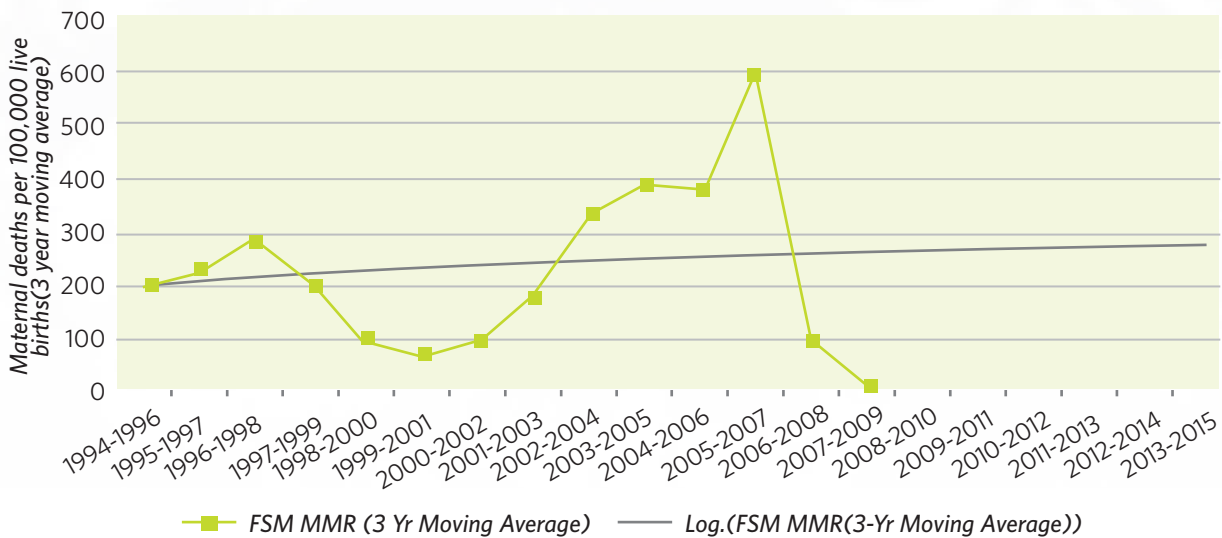
Table 2.5-2. Reported Maternal Deaths

Source: FSM DH& SA

Year	# Deaths Reported					Reported Live Births	Rate/100,000 live births
	Kosrae	Chuuk	Pohnpei	Yap	FSM		
1999	0	0	0	1	1	2528	39.6
2000	0	0	1	0	1	2594	38.6
2001	1	0	0	1	2	2560	78.1
2002	0	0	4	1	5	2577	194.0
2003	0	0	1	5	6	2569	233.6
2004	5	5	0	3	13	2246	578.8
2005	1	1	5	1	8	2369	337.7
2006	0	5	0	0	5	2147	232.9
2007	1	0	0	0	1	2174	46.0
2008	0	0	0	0	0	2119	0.0
2009	0	0	0	0	0	2157	0.0
Total	8	11	11	12	42	26,040	161

Figure 2.5-1. FSM MMR (3-Yr Moving Average)

Sources: 1994-1998 UNICEF; 1999-2009 FSM DHSA



Between 1999 and 2009, there were 42 reported maternal deaths evenly distributed across the four states yielding an 11-year average MMR of 162 per 100,000 live births. Across the four states, the 11-year average MMR was:

- Chuuk, 98;
- Kosrae, 384;
- Pohnpei, 108;
- Yap, 462.

90% of deaths occurred between 2002 and 2006 but no maternal deaths were reported in 2008 and 2009. The extremely high death rates in the 2002-2006 period has caused United Nations agencies to label FSM as a high maternal mortality country.

With respect to Target 5-A, in view of the sporadic pattern of maternal deaths, it is difficult to project future progression since there is little known about the cause of the spike in 2002-2006. If the cause(s) was temporary or reflected underlying weaknesses in obstetrical services that have subsequently been resolved, chances are good that maternal mortality will remain low. If, however, the causes reflect an unresolved weakness in services, then a new spike in deaths could occur at any time.

To better assess the situation, earlier data drawn from a UNICEF Situation Analysis (2004) have been combined with more recent data from the FSM DHSA and plotted using a 3-year moving average in an effort to "smooth over" annual fluctuations in mortality. A logarithmic trend has then been projected from these data. The result is a slightly increasing trend line (Figure 2.5-1). This suggests that the FSM should be classified as off-track with respect to MDG 5 although the weakness of the information based due to small numbers must be acknowledged.

Whether on-track or off-track, given the vulnerabilities women face during pregnancy, especially in outlying islands, more effort is still needed to strengthen prenatal and obstetric services, especially in remote areas, and to ensure that pregnant women encountering complications of pregnancy or delivery outside the main islands have access to transportation to reach higher level services.

Births attended by skilled personnel.

The FSM DHS classifies any trained health worker, including health assistants and certified birth attendants, as skilled health personnel. On average, 86% of reported births occur in a health facility (Figure 2.5-2) and 88% are attended by skilled health personnel (Figure 2.5-3). The fluctuations in these graphs suggest that continuity of services may be a problem and reinforce the classification of the FSM as “off-track” with respect to MDG 5.

MDG Target 5-B. Reproductive Health Services

Global: By 2015, achieve universal access to reproductive health services.

FSM: By 2015, achieve universal access to high quality reproductive health services throughout the lifespan.

MDG Target 5-B. has four indicators: (1) contraceptive prevalence rate; (2) adolescent fertility rate; (3) births preceded by antenatal care (at least 1 visit and 4 or more visits); and (4) unmet need for family planning services. Data are available to assess progress relative to indicators 1-3; no data are available with respect to indicator 4.

Reproductive Health Services:

In 2000, there were 24,174 women of childbearing age (15-44 years) resident in the FSM. Of this number, 14,352 (59.4%) resided on the main islands of Kosrae, Pohnpei, Weno, and Yap Proper (Figure 2.5-4). Women resident on the main islands enjoy reasonably good access to a wide range of reproductive health services subject only to temporary gaps in continuity of care. Outside of the main islands, basic services are available through dispensaries staffed by health assistants (and on some islands in Yap, certified female birth attendants). These services are limited by the skill level of providers and erratic transportation services. On-island services are supplemented from time-to-time by visiting medical teams from the main island able to provide a wider range of higher-level services

Fertility. Women in the FSM are opting to have fewer children as indicated by declining Total Fertility Rates (TFR).⁵⁰ The TFR based on census data for the past 30 years is:⁵¹

- TFR 1973 8.3 children
- TFR 1980 7.4 children
- TFR 1994 4.6 children
- TFR 2000 4.4 children

Figure 2.5-2. Births (%) in Health Facilities
Source: 2008 FSM Statistical Yearbook & DHS

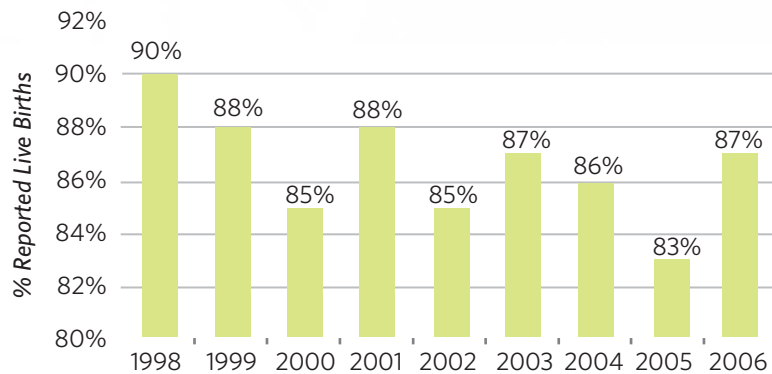
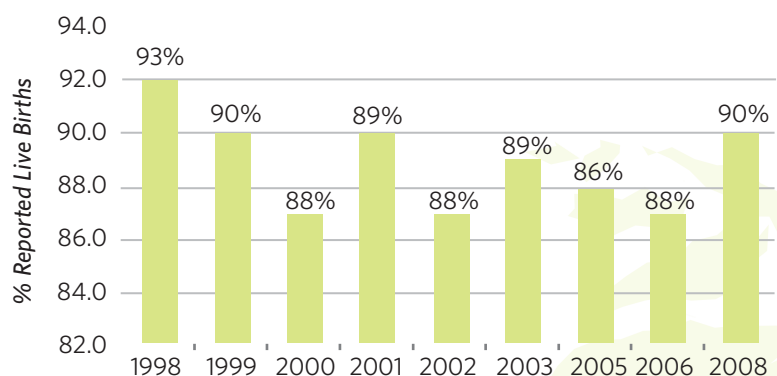


Figure 2.5-3. Births by Skilled Personnel
Source: 2008 FSM Statistical Yearbook



⁵⁰ Total Fertility Rate (or TFR) is the average number of children a woman will have had at the end of her reproductive years.

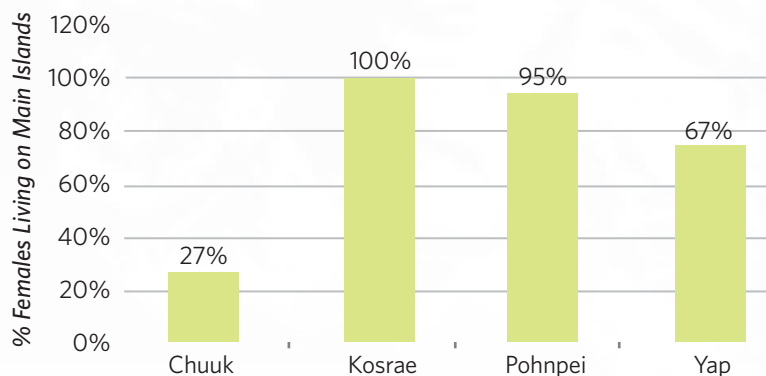
⁵¹ The TFR for 2006 based on civil registration was 2.7 births per woman (FSM Statistical Yearbook, 2008). This suggests continued under-reporting since it would be unusual for birth rates to drop so sharply over a short period (e.g. 2000 to 2006).

This trend reflects wider access to contraceptives, declining infant and child mortality, and expanding educational and employment opportunities for women. Based on 2000 census data, FSM women with college education had a TFR of 1.8 while women with some high school education (but no diploma) had a TFR of 4.8 and women with only elementary schooling had a TFR of 5.0 (Census Analytic Report, Table 4.6, page 29). For the same period women not in the labor force had a TFR of 5.5 while women who were employed full-time had a TFR of 2.5 (Census Analytic Report, Table 4.7, page 29). FSM fertility rates remain

high by world standards and would result in serious population pressures were it not for the safety valve provided by the option to migrate to the United States that results from the FSM's special relationship with the United States through the COFA.⁵²

Figure 2.5-4. Women 15-44 Resident on the Main Islands

Source 2000 Census



Contraceptive Prevalence. Contraceptive prevalence is the proportion of women 15-49 years of age who use modern family planning methods. Estimates for the FSM are based on women who use contraceptives obtained through the government health system. While this includes most family planning acceptors, it results in some under-reporting since some women obtain contraceptive supplies from private or off-island providers and some forms of contraception (e.g. foam and condoms) do not require medical consultation. DHS estimates of contraceptive prevalence (Table 2.5-3) show that contraceptive prevalence declined sharply after the 1990 base year; although rates have subsequently increased they remain below the 1990 base year.

The pattern shown in the table is unusual and cannot be satisfactorily explained with available information although reasons for reduced prevalence could include: erratic services due to geographic constraints and discontinuity of supplies; cultural beliefs; and religious beliefs.

A review of age-specific fertility rates for FSM women based on the 2000 census finds that women over the age of 35 years continue to experience high levels of fertility. This suggests an unmet need for contraceptive services since fertility tends to fall first among older women once contraception becomes widely available.

Table 2.5-3. Contraceptive Prevalence

Year	Female Contraceptive (Users/1000 Females ages 15-49)
1990	450
2007	282
2008	370
2009	400

Source: 1990 based on FSM DHS report to the MDG Task Force, 2009; 2007-2009 based on FSM DHS annual reports to U.S. DHHS Title X Program.

⁵² Under the Compact of Free Association, FSM citizens have visa-free access to the United States for resident, school, and work.

Adolescent Birth Rate. The birth rate for women 15-19 years of age based on civil registration is shown in Figure 2.5-5. Over the past decade the birth rate to adolescents has steadily declined, a reflection of improved access to reproductive health services, including reproductive education, for adolescents. Census data, confirm the direction and slope of the observed trend (Table 2.5-5).

Antenatal Care. The DHSA reports that in 2004, 92% of women giving birth had attended at least one antenatal visit while only 8% gave birth without attending a clinic (DHSA-MCH, 2006). (Note that data are unavailable to assess the MDG indicator of 'four or more antenatal visits per pregnancy'). The indicators that FSM monitors most closely to assess antenatal care are: (1) % of pregnant women initiating prenatal care during the first trimester and (2) % of births for which expected antenatal visits are greater than or equal to 80% on the Kotelchuck Index.⁵³

Encouraging women to begin antenatal care in the first trimester has long been a challenge for the FSM. Figure 2.5-6 suggests that education and promotion efforts as well as changes in health care services (e.g. increased use of female providers in the Outer Islands of Yap) are beginning to have the desired impact. First trimester antenatal care has increased from under 10% of births (1999) to over 40% of births (2008) while continuity of care, as measured by the Kotelchuck Index has increased from 44% (1999) to 60% (2009) (Figure 2.5-7).

Unmet need for Contraception. There are no data for this indicator although as noted, high fertility after age 35 suggests that there is at least some unmet need. Although data for this indicator is most commonly collected through a population-wide Reproductive Health Survey, a much cheaper way to obtain

Figure 2.5-5. Teen Fertility
(Births Per 1,000 Women Aged 15-19)
Source: FSM Statistical Yearbook 2008

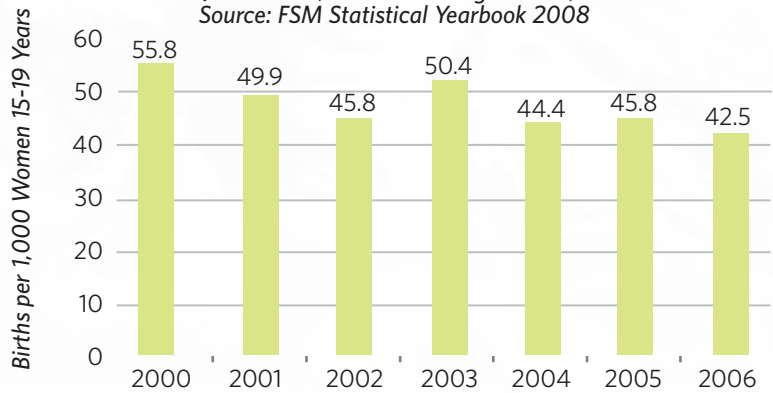
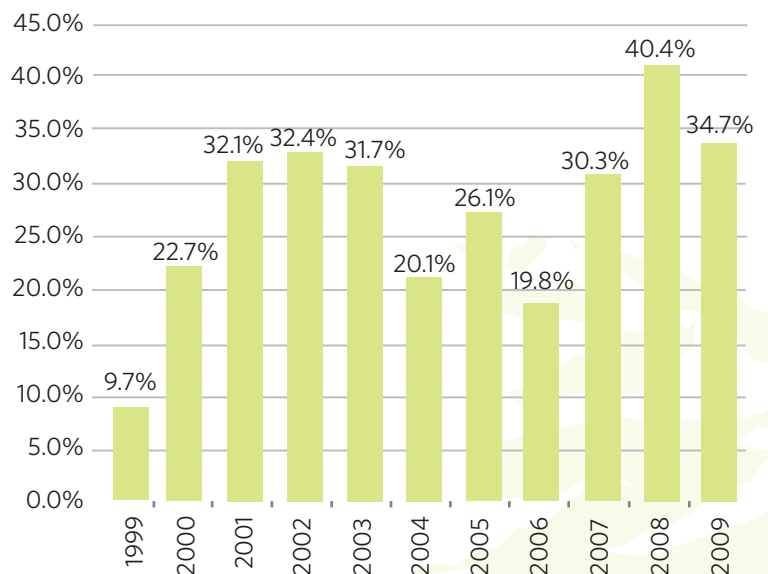


Table 2.5-4. Total Fertility for Women 15-19
(Source: Census Data)

Year	Total Fertility of Women 15-19
1973	90/1000
1980	67/1000
1994	54/1000
2000	44/1000

Figure 2.5-6. 1st Trimester Antenatal Care
Source: FSM DHSA (Family Health Unit)



⁵³ The Kotelchuk Index measures the adequacy of antenatal care by combining measures of gestational month in which care was initiated with risk-adjusted number of visits recommended over the course of a pregnancy.

indicative data is with a PRAMS-like survey of antenatal and postpartum clinic clients.

Other indicators. The FSM DHSA, in cooperation with the U.S. Department of Health and Human Services has selected several other indicators of maternal health for routine monitoring. Among these are indicators of anemia and Hepatitis B (Table 2.5-5). Anemia rates are particularly high, a significant risk factor for complications in delivery.

FSM and the Region.⁵⁴ Global progress toward the MMR reduction target is far off-track with MMR falling only modestly from a baseline of 480 (1990) to 350 (2005). In the Pacific, most Polynesian and Micronesian countries are on track to achieve the MMR reduction target. Other Melanesian countries are making good progress albeit remaining slightly off-track. PNG and Tonga, however, have seen significant increases in MMR.

Most Pacific Island countries are on-track to meet targets relative to birth attendance. Performance against antenatal targets is mixed while most countries remain off-track with respect to access to comprehensive reproductive health services and access to modern contraceptives.

2015 and Beyond. Due to small numbers it is difficult to draw conclusions about the status of the FSM vis-à-vis MDG 5. Using widely accepted methods of projection, however, FSM must be considered "off-track" with respect to MMR reduction targets. With respect to universal access to reproductive health services, there remain significant gaps in access for the 41% of women (ages 14-45) who resident in the outlying islands. This is particularly true in Chuuk and Yap which have the most widely dispersed populations.

Figure 2.5-7. % of Births Achieving 80% of Higher Score on Kotelchuk Index

Source: DHSA (Family Health Unit)

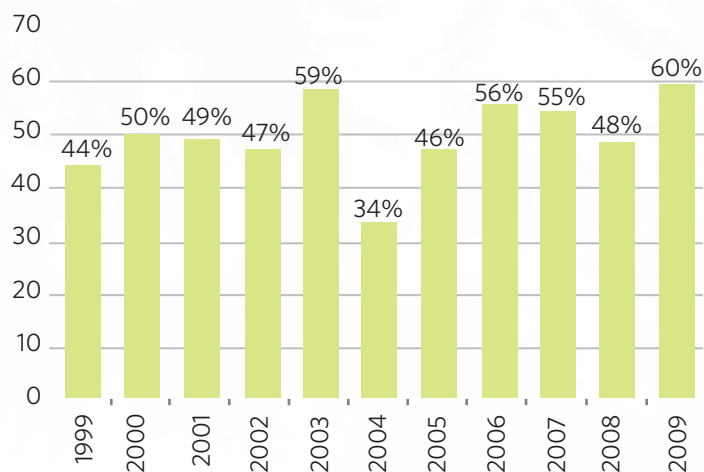


Table 2.5-5. Supplemental Indicators of Maternal Health

Source: FSM DHSA (Family Health Unit)

	2000	2003	2006	2009
Pregnant women positive for HB	5.6%	5.6%	7.5%	5.8%
Pregnant women with anemia	19.3%	52%	51%	27%

⁵⁴ Source of comparative data: UNDP-PIFS (June 2010). Cairns Compact Deliverables. 2010 Regional MDG Tracking Report.



Photo courtesy of FSM Information Services

Millennium Development Goal 6 : Combat HIV and AIDS, Malaria, and other Diseases

Table 2.6-1. FSM National Indicators at a Glance - MDG 6 HIV and AIDS, Tuberculosis and NCDs

Indicator	Base Data		Most Recent Data		2015	Data Source
	Year	Value	Year	Value	FSM Target	
Target 6-A. By 2015, halt and begin to reverse the spread of HIV and AIDS						
HIV and AIDS incidence (cumulative count)	1989	1	1989 thru 2009	37	Not Applicable	FSM DHSA
Deaths due to AIDS (cumulative count)	1989	0		28		
HIV and AIDS prevalence rate (persons living with HIV & rate per 100,000 population)	1989	1/0.9	2009	9/8.3		
HIV and AIDS prevalence per 100,000 for persons 15-24 years of age (cumulative cases & prevalence rate)	1989	0/0	1989 thru 2009	7/31		FSM DHSA
Condom use at last high risk sex (various)	---	NAv	2007	0-50%	100%	2nd Generation Surveys FSM-SPC
Proportion of population 15-24 with good knowledge of HIV-AIDS (various surveys)	---	NAv	2007	12-26%	100%	
AIDS orphans 10-14 years (%) attending school	Not applicable; no AIDS orphans					---
Target 6-B. Achieve, by 2010, universal access to treatment for HIV/AIDS for all those who need it						
Access to antiretroviral drugs (persons with advanced HIV infection)	1989 - 2006	0%	2007 - 2009	100%	100%	FSM DHSA
Target 6-C. By 2015 have halted and begun to reverse the incidence of malaria, tuberculosis, and other major diseases						
Indicators 6-C.1-3 address malaria	Not applicable; no localized malaria transmission					---
Tuberculosis						---
Incidence of TB (cases/rate per 100,000)	1992	105	2008	146	0.0	WHO (1992 & 2000) DHSA (2008)
Prevalence (cases/rate per 100,000)	1992	NAv	2008	168	0.0	
Deaths (number/rate per 100,000)	2000	13	2008	14.8	0.0	
DOTS coverage (smear positive only)	2000	100%	2008	100%	100%	
Tuberculosis cases (%) cured under DOTS	---	NAv	2008	20%	100%	
Target 6-D. NCDs - by 2015 halt and begin to reverse the prevalence of NCDs (cases/prevalence per 100,000)						
Diabetes prevalence (Pohnpei ages 25-64 only)	2002	21.2%	---	NAv		STEPS survey (WHO & FSM)
Tobacco use (Pohnpei only ages 25-64; smokers & smokeless tobacco users)	2002	31.6/ 11.4	---	NAv		
Physically inactive (Pohnpei ages 25-64 only)	2002	64.3%	---	NAv		
Overweight or obese (Pohnpei ages 25-64 only)	2002	73.1%	---	NAv		

Partially on-track;
further progress
expected

Section 2.6.

MDG 6. Combat HIV and AIDS, Malaria, and other Diseases

Introduction: MDG 6 targets HIV-AIDS, malaria, tuberculosis, and other diseases. Since the Anopheles mosquito that carries malaria is not present in the FSM, there is no local transmission of malaria; malaria-related targets and indicators are therefore omitted from this report. Under "other diseases," countries are encouraged to customize MDG 6 according to national health priorities. The FSM has chosen to incorporate non-communicable diseases, with a special focus on *diabetes mellitus*.

MDG Targets 6-A & 6-B. HIV and AIDS

(A) By 2015, halt and begin to reverse the spread of HIV and AIDS.

(B) Make antiretroviral therapy widely available to persons with advanced HIV infection.

The two HIV-AIDS targets are supported by 5 indicators:

- HIV prevalence among persons aged 15-24 years of age;
- Condom use at last high risk sex;
- Proportion of persons aged 15-24 years with comprehensive correct knowledge of HIV/AIDS;
- Proportion of AIDS orphans enrolled in school;
- Proportion of persons with advanced HIV infection with access to anti-retroviral therapy.

Of these five, the indicator relating to AIDS orphans is not relevant in the FSM as there are no AIDS orphans. For indicators relating to condom use and HIV-AIDS knowledge, information is available only from Pohnpei, Yap, and Chuuk states. A second generation risk assessment survey is now underway in Kosrae that will generate these data for that state.

HIV Prevalence. Since the first HIV case was reported in 1989, there have been a total of 37 cases. Of those affected, 28 persons have died and 9 are living (as of December 2009). A caseload of 9 yields a current prevalence rate of 8.3 cases per 100,000 population and a cumulative prevalence (since 1989) of 34.6 cases per 100,000 population. Figure 2.6.1 shows cases according to year of diagnosis.

Among cases to-date, 24 have been male and 13 female. Cases have been reported from all of the FSM states (Tables 2.6-2 and 2.6-3). Seven cases (19%) have occurred among youth 15-24 years of age (cumulative prevalence rate, 31 cases per 100,000). Although heterosexual contact is the leading mode of transmission, men-who-have-sex-with-men (MSM, 16%) and mother-to-child transmission (MTC, 14%) are also significant.

HIV Strategy. The FSM has prepared a National Strategic Plan for HIV, AIDS, and Sexually Transmitted Infections (STIs) which sets two over-arching national goals:

1. Prevent further spread of infection;
2. Prevent and reduce the socio-economic impact of HIV and AIDS.

Table 2.6-2. FSM HIV and AIDS Cases by Age

(Cumulative cases 1989-2009)

Source: FSM DHSA

Age Group	Cases	% of Total Cases
0-14	5	14%
15-24	7	19%
25-44	23	62%
45+ and Unknown	2	6%

Source: FSM DHSA, 2009. Presentation before MDG Task Force

Table 2.6.3. Cumulative HIV and AIDS Cases by State, 1989-2009

(Source: FSM DHSA)

State	Cases (Actual number)	Cumulative Prevalence (cases per 100,000 population) ⁵⁵
Kosrae	4	52.0
Pohnpei	8	23.2
Chuuk	23	42.9
Yap	2	17.8
National	37	34.6

⁵⁵ Based on mid-point population 2000 (census data).

Accordingly, HIV/AIDS programs are operating at both national and state levels with priority given to prevention and community-based planning, surveillance, and care for persons living with HIV or AIDS. HIV and AIDS programs are supported by grants from the U.S. Department of Health and Human Services and United Nations Programme on HIV/AIDS (UN-AIDS) through the Secretariat of the Pacific Community (SPC). Since August 2007, free anti-retroviral treatment has been available for patients with funding from UN-AIDS and the U.S. Ryan White grant program. Of the 9 current patients, 8 are on anti-retroviral therapy with the remaining patient expected to commence therapy soon (FSM DHSA, personal communications, 2010).

Behavior and Knowledge. Second generation HIV surveys were conducted over the period 2006-2008 in Yap (among youth and police), Pohnpei (among youth, police, and antenatal clients), and Chuuk (among residents of Pattiw Island group, an outlying atoll). Despite two decades of education and awareness programming, these surveys reveal that high risk (heterosexual) behaviors are still common while knowledge about HIV-AIDS remains low and negative attitudes toward persons living with HIV are pervasive (Table 2.6-4).

- Early sexual intercourse and casual sex are common especially among males;
- Condoms are used infrequently and inconsistently during casual sex;
- Knowledge about even the most basic HIV prevention strategies is low especially among women and youth;
- Misconceptions about how HIV is transmitted are widespread;
- Many people continue to hold negative attitudes toward persons infected with HIV.

Figure 2.6-1. HIV Cases by Year of Diagnosis, FSM
 Source: FSM Department of Health and Social Affairs

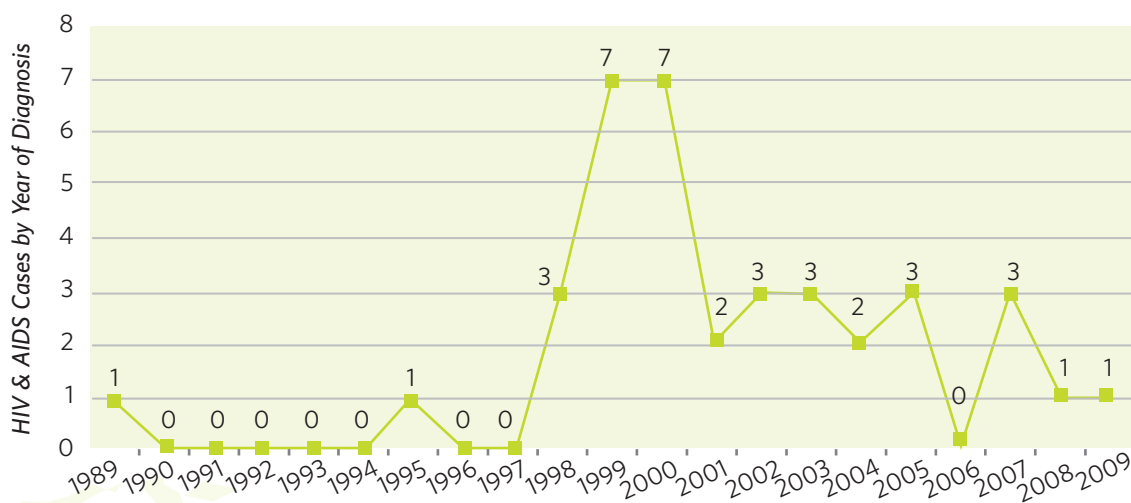


Table 2.6.4. HIV Knowledge, Attitudes, Behaviors
(Summary of Second Generation Survey Findings, 2006-2008)

Indicator	Yap SGS		Pohnpei SGS			Chuuk SGS (ages 15-49)
	Youth	Police	Youth	Police	Antenatal	Pattiw Islands
Sample size	M=91; F=92	M=30	M=137; F=143	M=114	F=248	M=125; F=172
Multiple sex partners last 12 mos.	39%	37%	34%	26%	15%	F=31%; M=51%
Condom use						
Ever used	65%	66%	42%	47%	46%	F=41%; M=64% T=51%
Used 1st sex	34%	NAv	12%	3%	NAv	NAv
Used last high risk sex	33%	20%	35%	0%	50%	30%
Correct knowledge of HIV prevention & transmission	12%	83%	26%	68%	21%	F=24%; M=23%
Positive attitudes toward persons living with HIV	11%	50%	16%	NAv	NAv	F=15%; M=19% T=16%
Tested for HIV	38%	40%	20%	41%	30%	F=12%; M=6% T=10%

Innovations in Progress. With technical and financial support from United Nations Fund for Population Activities (UNFPA) and other partners, new initiatives have been launched in Chuuk State to improve linkages between Sexual and Reproductive Health Services (SRH), Sexually Transmitted Infection Services (STI), and HIV services. HIV/STI services have been integrated into antenatal services by ensuring continuous availability of test kits and training of lay counselors to support pre and post HIV testing. Parallel upgrades have integrated HIV, STI, and SRH services in the Youth Health Resources and Development Center and the newly established Men's Wellness Clinic and Center. These clinical improvements are supported by community mobilization and outreach to encourage health-seeking behaviors and especially uptake of HIV and STI services. It is envisaged that these developments in Chuuk will provide a service model that can be adapted to the other FSM states and elsewhere across the Pacific Region.

MDG Target 6-C. Malaria and Tuberculosis

By 2015, to have halted and begin to reverse the incidence of malaria and tuberculosis.

Target 6-C. has five indicators, three of which address malaria and are not relevant in the FSM. The remaining two indicators address tuberculosis:

- Incidence, prevalence and death rates associated with tuberculosis;
- Proportion of tuberculosis cases detected and cured under directly observed treatment short course (DOTS).

Tuberculosis. Tuberculosis continues to be a significant cause of morbidity and mortality in the FSM. Prevalence rates have steadily increased in recent years; the 2008 prevalence rate was 168 cases per 100,000. Death rates have also increased (2008, 14.8 per 100,000). Multi-drug resistant (MDR) cases are being reported from every state, with MDR a particularly serious

Table 2.6-5. Tuberculosis, Key Indicators

Year	New Cases (incidence)		Total Cases (prevalence)		TB Deaths		DOTS Coverage (% of smear positive cases)	Cure Rate
	#	Rate/100,000	#	Rate/100,000	# Deaths	Deaths per 100,000		
1992	111	105	NAv	NAv	NAv	NAv	100%	NAv
2000	91	85	124	116	---	13.0	100%	NAv
2006	101	94	112	104	1	0.92	100%	23%
2007	133	123	142	131	9	8.3	100%	15%
2008	158	146	181	168	16	14.8	100%	20%

Source: 1992 & 2000 WHO Reports; 2006-8 FSM DHSA (tuberculosis unit)

Note that prior to 2006, states reported DOTS compliance but some did not comply with all components of DOTS

problem in Chuuk which has recently experienced an MDR outbreak (FSM DHSA, personal communications). Although states have reported near universal levels of DOTS coverage for a number of years, strict adherence to DOTS protocols was not achieved until 2006. Despite use of DOTS, cure rates remain low (Table 2.6-5). Despite the poor current indicators, tuberculosis is a national health priority and a number of measures are in progress to reverse the negative trends. There is a good chance that the FSM can be "on track" with tuberculosis by 2015.

MDG Target 6-D. Non-Communicable Diseases

By 2015, halt and begin to reverse the prevalence of non-communicable diseases.

Non-communicable diseases, including diabetes mellitus, cerebrovascular and heart diseases, cancers, and chronic obstructive pulmonary diseases, are at epidemic levels in the FSM. In contrast to industrialized countries where the NCD affect mainly older middle aged adults and senior citizens, NCDs in the FSM begin to exact a toll relatively early in life. 64% of deaths in the 25-44 age group

and 90% of deaths in the 45-64 age group are due to NCDs (FSM DHSA). Overall, 8 out of every 10 deaths in the FSM are caused by NCDs. Beyond mortality, NCDs are the leading cause of hospital utilization, off-island referral, and disability. NCDs are a significant cause of individual and family hardship and a constraint to national social and economic development (DHSA, Report to the National MDG Task Force, 2009).

A coordinated and comprehensive NCD program was inaugurated by the FSM DHSA in 2007 and is still being developed. Initially three programs - cancer, NCDs, and nutrition - integration is now in progress since all NCDs have similar causes and interventions.

Table 2.6-6. Leading Causes of Death, FSM

1990-2003	2004-2008
1. Circulatory system	1. Circulatory system
2. Respiratory system	2. Endocrine system
3. Endocrine system	3. Cancer
4. Cancer	4. Respiratory system
5. Injuries & accidents	5. Infectious and parasitic diseases
6. Parasitic and infectious diseases	6. Injuries and accidents
7. Digestive system	7. Digestive system
8. Urinary system	8. Urinary system
9. Central nervous system	9. Central nervous system

Table 2.6-7. Adults (25-64 years of age) at Risk of NCDs, Pohnpei, 2002

Risk Factor	Population Ages 25-65 (n=1,638)	Women (n=996)	Men (n=642)
Smokers	31.6%	21.0%	42.0%
Daily smokers	25.5%	16.1%	34.8%
Mean years of smoking	21.6	20.4	22.0
Users of smokeless tobacco	11.4	3.0	22.4
Current users of betel nut	29.9%	16.0%	43.5%
Used alcohol in past 12 months	28.7%	9.9%	47.5%
Average # drinks per day (among those who use alcohol)	6.4	3.3	7.0
Have drunk sakau	68.9%	58.9%	78.7%
Mean servings of fruits and vegetables per day	3.4	3.4	3.3
Persons reporting low (< 5 servings per day) fruit and vegetable consumption	81.3%	82.4%	81.8%
Physical activity			
Low	64.3%	73.5%	55.7%
Moderate	13.5%	14.0%	13.0%
High	22.7%	12.6%	31.3%
Body mass index			
Underweight	1.2%	1.2%	1.3%
Normal	26.7%	16.2%	34.8%
Overweight	30.5%	26.9%	33.9%
Obese	42.6%	55.8%	30.0%
Hypertensive	21.2%	15.6%	26.8%
Diabetic	32.1%	37.1%	26.4%
High cholesterol	46.6%	44.8%	48.4%
Combined risk			
0 Risk factors	1.0%	0.5%	1.4%
1-2 Risk factors	42.3%	38.9%	45.3%
3-5 Risk factors	56.7%	60.5%	53.3%

Source: World Health Organization (2008). Federated States of Micronesia (Pohnpei) NCD Risk Factors: STEPS Report.

National prevalence data are not yet available as disease registries are still being established (nationally for cancer and in Pohnpei for diabetes).

NCDs are often referred to as “lifestyle” diseases because of their close link to behavioral risks including: tobacco use, alcohol abuse, physical inactivity, poor diet, and overweight/obesity. Table 2.6-7 summarizes some of the key findings on NCD risks drawn from the Pohnpei NCD risk factor assessment of 2002. These results indicate a huge reservoir of future morbidity and premature mortality. They do, however, offer hope since virtually all of the risks are amenable to behavioral and/or environmental change.

Although limited data are available at present, the FSM proposes to integrate over time six indicators in support of the MDG-NCD target. The six are:

- Diabetes mellitus prevalence rate;
- Cancer incidence rate;
- Tobacco use rate;
- Low physical activity rate;
- Overweight and obesity rates.

At present these data are available only for Pohnpei drawn from the 2002 risk survey. A first generation NCD survey has been completed in Chuuk but not yet published. First generation surveys are in progress in Kosrae and Yap and a second generation survey is underway in Pohnpei. Over time prevalence data will become available nationally as disease registries are established and risk data will become available from the other states as surveys are completed.

FSM and the region.⁵⁶ FSM, like most Pacific Island nations, faces a triple threat of disease – continuing high rates of communicable diseases including tuberculosis, a widening epidemic of non-communicable diseases, and the threat of new diseases linked to globalization, climate change, and the increased permeability of borders. Severe Acute Respiratory Syndrome (SARS), Avian flu, and Influenza A (H1N1) are just three recent examples of this last category. Across the region, no country is fully on track to achieve the three components of MDG 6 – HIV/AIDS, malaria/tuberculosis, and non-communicable diseases.

While the epicenter of HIV/AIDS in the Region remains Papua New Guinea, Fiji, Kiribati, Tuvalu, and Nauru are also off-track with respect to this target. Thus far the FSM has been lucky to experience a relatively small number of cases but the widespread high-risk sexual behaviors and frequent reports of sexual violence, mean that ongoing surveillance and education is imperative.

The incidence of tuberculosis in the FSM is nearly three times the regional average (FSM 148/100,000; regional average 48/100,000) and multi-drug resistant cases are becoming a serious problem. While, the national and state departments of health are taking aggressive measures to counter the problem, the FSM joins all of its Micronesian neighbors (with the exception of Palau) in being off-track with respect to tuberculosis targets.

Non-communicable diseases are at epidemic levels throughout the Pacific Region. While no Pacific Island country is on-track with respect to NCD targets, many are at a more advanced stage of surveillance and program development than is the FSM.

2015 and Beyond. FSM is on-track with respect to HIV/AIDS although aggressive programming is still needed to counter the threats posed by risky sexual behaviors and frequent movements of population between the FSM and neighboring jurisdictions with high rates of HIV/AIDS.

With respect to tuberculosis, the FSM is off-track now but is working diligently to strengthen programming so that the target is achievable by 2015 with re-invigorated effort.

With respect to NCDs, the FSM has been slower than many of its neighbors to implement aggressive prevention and disease-management programs. While it is unlikely that the FSM can “halt and reverse” the spread of NCDs by 2015, it should be possible for a solid program of surveillance, prevention, and disease management to be in place in all four states by that time.

⁵⁶ Source of comparative data: UNDP-PIFS (June 2010). Cairns Compact Deliverables: 2010 Regional MDG Tracking Report.



Photo courtesy of Secretariat of the Pacific Community

Millennium Development Goal 7 : Ensure Environmental Sustainability

Table 2.7-1. FSM National Indicators at a Glance - MDG 7 Environment

Indicator	Base Data		Most Recent Data		2015	Data Source
	Year	Value	Year	Value	FSM Target	
Target 7-A. Integrate the principles of sustainable development into country policies and programs; reverse the loss of environmental resources						
Proportion of land covered by forest	1986-87	83%	2006-07	89%	---	US Dept. of Agriculture Forestry Service
CO2 emissions per capita (Gg-CO2 per capita)	1994	2.4	2008	3.91	0.0	1st National Communication on Climate Change
Consumption of ozone depleting substances (ODP tons per year)	1986	1.3	2008	0.2	0.0	http://ozone.unep.org
Proportion of fish stocks within safe biological limits: inshore	Limited quantitative data; species depletion evident due to overfishing, destructive fishing practices, and pollution				100%	George, et al., n.d.; Pohnpei Conservation Society
Proportion of fish stocks within safe biological limits: offshore	1990	NAv	2010	100%	100%	FSM Tuna Commission
Proportion of total water resources used (main islands)						
Normal conditions	---	---	N.D.	23%	---	SPREP
Drought	---	---	N.D.	38%	---	SPREP
Target 7-B. Reduce biodiversity loss; by 2010 achieve a significant reduction in the rate of loss						
Proportion of terrestrial area protected	---	---	2010	23%	20%	FSM Dept. of Resources & Dev.
Proportion of in-shore marine resources protected	---	---	2010	5%	30%	
Species (mammal, bird, higher vascular plants) threatened with extinction	Species on IUCN Red List, CITES list, or U.S. EPA list include: 1 species of terrestrial mammal, 1 species of marine mammal, 10 bird species, 5 reptiles species, 1 crustacean, 3 mollusks, 3 groups of plants and 7 individual species				---	Falanruw, 2002 Edward, 2002
Target 7-C. By 2015, halve the proportion of the population without sustainable access to improved drinking water and sanitation						
Proportion of the population using an improved water source	1994	29%	2005	57%	100%	Census (1994) HIES (2005)
Proportion of households with toilet facilities	1994	44%	2005	73%	100%	
Proportion of the population using an improved sanitation source	1994	27%	2000	25%	100%	Census
Target 7-D. By 2020, to have achieved a significant improvement in the lives of slum dwellers						
Urban households living in slums	Not applicable				---	---

Section 2.7.

MDG 7. Ensure Environmental Sustainability

Introduction. The Millennium Declaration recognizes the primacy of sustainable environmental management – a worthy goal in its own right and a key strategy for poverty reduction. Likewise, the FSM Government recognized the environment as being the foundation for a prosperous future.

The social, cultural, and economic prosperity of the Federated States of Micronesia has been and will continue to be directly dependent upon the health of its coral reefs and interconnected ecosystems (FSM UNFCCC, National report, 1997).

Natural Heritage. Millions of years ago undersea volcanic activity created the islands that now comprise the Federated States of Micronesia. Isolation – from one another and from continental land masses – allowed the evolution of unique ecosystems and a large number of endemic species.

At least 13 distinct terrestrial and 14 distinct marine ecosystems have been described (Falanruw, 2002; Edwards 2002). The inventory of species found in those ecosystems is far from complete; survey work has been limited and reports are scattered among numerous overseas research institutions. The most comprehensive inventory of biodiversity currently available was prepared in 2002 in support of the National Biodiversity Strategic Action Plan (NBSAP) by Falanruw (terrestrial) and Edwards (marine). They described:

- Over 1,239 species of ferns and flowering plants including 782 native and 200 endemic species;
- Five endemic terrestrial mammal (fruit bat) species;
- Eight introduced mammal species (3 species of rat, a mouse, deer, pigs, dogs, and cats) in addition to periodic introductions of goats, rabbits, and cattle;
- One introduced amphibian (*Bufo marinus*), and over 27 species of reptiles, most of them native and at least one endemic (*Emoia ponapea*);
- A rich but relatively unexplored collection of invertebrates;
- 119 species of birds including 31 resident seabirds, 33 migratory shorebirds, 19 migratory land or wetland birds, and 5 vagrant species (Engbring, et al, 1990 as reported by Falanruw, 2002);
- 1,000 species of inshore fish including at least 12 endemics;
- Several species of marine mammals (dolphins and whales);
- Four species of marine turtles;
- Over 350 species of hard corals and 60 species of soft corals;
- 150 species of algae and sea grasses;
- Several hundred species of mollusks, echinoderms, and crustaceans;
- Deepwater living resources including three commercially exploited species of tuna (skipjack, yellowfin, and bigeye) and several species of pelagic fish (swordfish, marlin, and sharks).

Solely dependent on their environmental resources for survival, the Micronesians who originally peopled the islands evolved rich traditions of environmental stewardship. Today, Micronesians continue to depend heavily on their natural environment. Between 1998 and 2005, the Household Income and Expenditure Surveys document an unprecedented movement of people turning back to the land and sea for their livelihoods. Across the nation, 18% of household income derives from subsistence production but this figure nearly doubles among low income households (32%).

With more people extracting more resources from the environment and with traditional stewardship practices waning, environmental resources are coming under increasing stress. The leading threats (in priority order) are: overfishing/overhunting; coastal erosion and sea level rise; water pollution; destructive harvesting; indiscriminant burning; erosion and sedimentation; incompatible commercial development; invasive species; dredging; and management of animal, human, and solid wastes

("Blueprint for Conserving Biodiversity in the FSM," p. 32). The ability of Micronesia's environmental resources to sustain future generations depends on careful stewardship that reinvigorates traditional conservation practices and merges these with modern scientific principles.

Environmental Strategy. The first consolidated national environmental strategy was articulated during the 2nd FSM Economic Summit (1999). This strategy called for establishing a "network of effective, community-managed, ecologically representative, and socially beneficial marine and forest protected areas ... to safeguard the nation's precious natural heritage." This strategy has been carried forward and progressively refined in the National Biodiversity Strategic Action Plan (NBSAP, 2002), the "Blueprint for Conserving the Biodiversity of the FSM" (2003), State-specific Biodiversity Strategic Action Plans (2004), the FSM Strategic Development Plan 2004-2023, and the National Environment Sector Plan (May, 2009).

The Strategic Development Plan identified nine goals for the environmental sector supported by 48 specific outcomes. The 2009 sector plan prioritized 14 of these outcomes for action over the period 2010-2015 (Table 2.7-3, page following). These activities are earmarked for environmental sector funding under COFA II in which environment is one of six sectors eligible for COFA funding (Table 2.7-2).

Table 2.7.2. COFA Sector Grants Allocated to Environment Sector, FY 04-06
(Millions of U.S. Dollars)

	FY 04	FY 05	FY 06
National	\$4.3	\$0.6	\$0.6
Chuuk	\$2.9	\$3.0	\$2.7
Kosrae	\$1.0	\$1.1	\$1.3
Pohnpei	\$1.7	\$1.5	\$0.8
Yap	\$1.8	\$1.5	\$1.3
Total	\$11.6	\$7.8	\$6.2
% sector grants allocated to environment	15.3%	10.3%	7.8%

Source: U.S. GAO (2006). Compacts of Free Association: Micronesia and the Marshall Islands Face Challenges... Washington, D.C.: Author.

Note: In addition to COFA and other ODA funding channeled through government, the Micronesian Conservation Trust, the funding arm for the Micronesia Challenge, provides about \$2 million annually in grants to NGOs, communities, and local governments. Other NGOs (e.g. the Nature Conservancy, the Conservation Society of Pohnpei, the Kosrae Conservation and Safety Organization, Yap Community Action Agency, etc) also channel significant funding to communities for conservation.

Institutional Capacity. Within the national government, environmental management is a shared responsibility between the Office of Environment and Emergency Management, Department of Resources and Development, Environmental Health (DHSA), and other offices with overlapping responsibilities. The Office of Environment and Emergency Management is the focal point for the environmental treaties and conventions to which FSM is a party while the Department of Resources and Development is the national focal point for the Micronesian Challenge.⁵⁷

State focal agencies include: State Departments of Resources and Development, State Environmental Quality Protection Boards (EQPB), and a network of non-government and community-based organizations.⁵⁸ An important non-government agency supporting community based conservation throughout Micronesia is Micronesian Conservation Trust, the funding arm for the Micronesia Challenge.

Target 7-A. Sustainable Development
Integrate the principles of sustainable development into country policies and programs; reverse the loss of environmental resources.

In addition to being a general statement of principle, Target 7-A has five specific indicators:

- Proportion of land covered by forests;
- Carbon dioxide (CO2);
- Consumption of ozone depleting substances;
- Proportion of fish stocks within safe biological limits;
- Proportion of water resources used.

⁵⁷ The Micronesia Challenge is an agreement by the Chief Executives of the Micronesian entities (Marshalls, Palau, FSM, Guam, and CNMI) to protect and sustainably manage at least 30% of inshore marine area and 20% of terrestrial area by 2020.

⁵⁸ Lead NGOs include: Conservation Society of Pohnpei, Kosrae Conservation & Safety Organization, Yap Community Action Program and Chuuk Conservation Society.

Table 2.7.3. Overview of National Environmental Sector Plan 2010-2015	
Goals	Selected Priority Targets
1. Mainstream environmental considerations, including climate change, into national policy, planning, and economic development.	1.1. Environmental Impact Assessments to be conducted on 100% of development activities; 1.2. 100% of environmental violations to be prosecuted.
2. Improve/enhance human environment and pollution control.	2.1. Reduce solid wastes using a 3-R strategy (reduce, reuse, recycle); designate and effectively manage solid waste disposal sites; 2.2. Ensure universal access to safe drinking water; 2.3. Improve coastal marine water quality.
3. Minimize greenhouse gas emissions.	3.1. Reduce use of petroleum-based energy sources; 3.2. Covert to renewable energy sources.
4. Enhance the benefits of sustainable use of genetic resources and ensure benefits are equitable shared among stakeholders.	4.1. Fully document traditional knowledge and practices relative to genetic resources.
5. Protect, conserve, and sustainably manage a full and functional representation of marine, freshwater, and terrestrial ecosystems.	5.1. Develop a nation-wide network of protected areas; 5.2. Sustainably manage all environmental resources.
6. Improve environmental awareness and education; increase citizen involvement in natural resource conservation.	
7. Establish bio-security (border control and quarantine) to guard against potentially invasive alien species.	
8. Create sustainable financial mechanisms for environmental conservation.	8.1. Increase access to external funding in support of environmental conservation.
9. Enhance in-country technical capacity to support environmental programs.	9.1. State and NGO staff to be technically competent to deal with all the environmental challenges facing the nation.

Forest Coverage. A baseline forest inventory was prepared in 1987-88 using 1975-76 aerial photography. A second inventory was prepared in 2006-2007 using satellite imagery supplemented by on-the-ground sampling (Table 2.7-4). Results appear to indicate expansion of forest coverage which contradicts well recognized deforestation in some areas, principally the upland areas of Pohnpei Island. This apparent expansion is misleading because the criteria for classifying an area as “forest” is based on canopy cover, not composition or function. In addition, the definition of “forest” differs in the two surveys. The earlier survey classified areas with at least 30% canopy cover as “forest” while the later survey classified areas with at least 10% canopy cover as “forest.” While gross forest cover is an important environmental indicator for some purposes (e.g. watershed management and green house gas offsets), primary forest cover is a more important indicator for biodiversity protection. As the FSM moves toward localization of the MDGs, consideration should be given to adding to the indicators ‘area under primary forest cover.’

Table 2.7-4. Forest Cover (% of land area covered with forest; main islands only)		
	Forest Inventory 1986-87	Forest Inventory 2006-07
FSM National	83%	89%
Chuuk	80%	83%
Kosrae	88%	94%
Pohnpei	86%	93%
Yap	66%	72%

Source: Donnegan, J.A., et al. (2006).

Carbon dioxide Emissions. The FSM is party to the United Nations Framework Convention on Climate Change (UNFCCC), the Kyoto Protocol, and the Vienna Convention. Citing the rapidly growing body of evidence documenting the adverse impact of global warming on small island states, the FSM Government is taking an increasingly active role in the international arena to call on industrialized nations to cut greenhouse gas emissions. Local vulnerabilities to climate change (listed in priority order) are shown in Table 2.7-5.

The FSM has recently embarked on two projects to address the impact of climate change. The Asian Development Bank is providing support for a “climate mapping” project that will identify infrastructure and human settlements requiring protection and/or relocation due to projected sea level rise and the increased frequency/intensity of adverse weather events. With support from the Global Environment Facility (GEF), a second project is getting underway in Kosrae to “climate proof” infrastructure that will be adversely affected by climate-related environmental changes. This latter is a pilot project to be extended to other states (subject to funding availability). In addition to these local initiatives, FSM is part to the “Green Micronesia Initiative.” This sub-regional initiative, spearheaded by the Chief Executives of the Micronesian governments, aims to increase energy efficiency (by 20%), increase energy conservation (by 20%), and expand renewable energy (to achieve 30% power generation from renewable technologies). The target date for achieving these targets is 2020 (Alik, 2010).

The FSM prepared a baseline assessment of greenhouse gas emissions in 1994. Total emissions (1994), expressed in CO₂ equivalents, were 246.01 Gigagrams per year (or about 2.4 Gg/capita/year).⁵⁹ Virtually all of the emissions (98%) come from the energy sector with only a small contribution from the agriculture sector. These emissions by volume are not significant in either the regional or global context. As a member of the global community, however, the FSM is committed to reducing its own domestic emissions while pressuring large producing countries to do likewise and to bolstering the “sink” value of its forests and reefs through forest and reef protective mechanisms.⁶⁰

Ozone Depleting Substances.

As a party to the 1986 Montreal Protocol on Substances that Deplete the Ozone Layer and subsequent amendments, the FSM is obliged to eliminate the use of a variety of substances harmful to the ozone by 2010 (Table 2.7-6). As shown, by 2008 FSM had succeeded in eliminating all but a small quantity of hydrofluorocarbons (HCFC).⁶¹ HCFCs are imported for refrigeration applications with the major user the commercial fishing industry. The FSM, together with other Pacific Island nations, is committed to phasing out use and importation of HCFC (Alik, 2010).

Table 2.7-5. FSM Climate Change Vulnerabilities

	Short-term	Long-term
Sea-level rise		X
El Nino events	X	X
La Nina events	X	X
Greenhouse gas emissions		X

Source: FSM National Government (1997). First National Communication to the UN Framework Convention on Climate Change.

Table 2.7-6. Consumption of Ozone Depleting Substances (ODP Tons)

	1986	1995	2000	2005	2008
ODS	1.3	1.3	1.0	0.4	0.0
CFCs	0.0	0.0	0.0	0.0	0.0
Halons	0.0	0.0	0.0	0.0	0.0
Other CFCs	0.0	0.0	0.0	0.0	0.0
Carbon Tetrachloride	0.0-	0.0-	0.0-	0.0	0.0
Methyl Chloroform	0.0	0.0	0.0	0.0	0.0
HCFCs	0.0	0.0	0.0	0.1	0.2
HBFCs	0.0	0.0	0.0	0.0	0.0
Bromochloromethane	---	---	---	0.0	0.0
Methyl Bromide	0.0	0.0	0.0	0.0	0.0

Source: FSM annual reports as shown on <http://ozone.unep.org>. (Last update May 21, 2010). Excludes methyl bromide used in plant quarantine; use for this purpose only is permitted by the Montreal protocol.

⁵⁹ This inventory includes aggregate emissions of carbon dioxide (CO₂), methane (CH₄), nitrous oxide (N₂O) and other greenhouse gases expressed in CO₂ equivalents. (Reference United Nations, 2005. 6th Compilation and Synthesis of Initial National Communications for Parties not Involved in Annex I of the Convention. PublicationFCCC/SBI/2005/18).

⁶⁰ A second greenhouse gas inventory was undertaken (2009-2010) with analysis now in progress. This information will be integrated into the FSM's Second National Communication on Climate Change to be completed by end-2010.

⁶¹ Originally promoted as a safe alternative to the more dangerous CFC-11 and CFC-12, HCFCs have recently been brought under the Montreal Protocol due to evidence that they contribute to global warming.

Fish Stocks. This MDG indicator – fish stocks within safe biological limits – must be broken into two components: (a) inshore fisheries and (b) offshore fisheries.

Inshore. Rapid ecological assessments of the marine environment have been carried out in the four states. In addition, marine monitoring programs are being established to provide long-term surveillance data. Information currently available shows that in-shore fish stocks near the main islands are over-exploited and threatened by destructive fishing practices and degradation of ecosystems from land-based discharges sedimentation and sewage discharge (George, et al., n.d.).

Overfishing has been identified as the most urgent and critical threat across biologically significant marine areas in all states (TNC, 2002). Population growth, increasing numbers of people using the reefs for their livelihood (see MDG 1), and a shift from subsistence to market production are putting pressure on fish stocks. A market analysis conducted by Pohnpei Conservation Society in 2006 estimated that 1.5 million pounds of reef fish are harvested annually around Pohnpei Island and that 70% of fish sold in the markets are immature (PCS as reported in George, et al., circa 2007). This level of harvest is highly unsustainable. Destructive fishing practices – poisoning and dynamite fishing and to a lesser extent net and night fishing – are putting further pressure on the resources. These threats are an indication of the extent to which the traditional fisheries management systems are breaking down as most of these threats would not be permitted if traditional management systems were intact (Smith, 1994).

Off-shore. Six purse seiners and 21 longline vessels were licensed in 2008 to fish in the FSM Exclusive Economic zone. Three species of tuna (yellow fin, big eye, and skip jack) account for 98% of catch which has varied in recent years from a high of 253,174 metric tons (1995) to a low of 37,338 metric tons in 2008 (Western and Central Pacific Tuna Commission, 2009). While all tuna species are under pressure, yellow fin and big eye are especially threatened. FSM, together with other resource owning nations (Marshalls, Palau, Kiribati, Tuvalu, and PNG) is taking action to stringently limit harvest of these resources in an effort to promote their sustainable exploitation.

Water Resources. The main islands of the FSM typically enjoy high levels of rainfall. Annual coastal rainfall in Kosrae and Pohnpei averages 200 inches while in the interior of Pohnpei annual rainfall averages 300 inches. Annual rainfall in Weno (Chuuk) averages 100-185 inches and in Yap 120 inches (SPREP, n.d). Rainfall in the outlying islands is variable and in most locations has not been scientifically measured. While prolonged drought is a rare occurrence in Pohnpei and Kosrae, it is an annual event elsewhere. Drought associated with periodic El Nino/La Nina events can be widespread, severe, and of extended duration.

Due to rainfall patterns and geology, only Kosrae and Pohnpei have perennial stream flows with Pohnpei in particular enjoying wide but short rivers that seldom run dry. On these islands, surface water is the main source of potable water. On the other large islands, streams are much smaller and dry for 20% of the year (SPREP, n.d.). Groundwater is the main source of potable water on Yap Island and many of the large islands in the Chuuk lagoon. In the outlying islands, the main source of potable water is a fragile freshwater “lens” floating on the underlying denser seawater beneath the islands. Throughout the FSM surface and ground water is typically supplemented at the household level by rainwater catchments.

Table 2.7-7. Water Resource Utilization – Main Islands Only

Location	Groundwater resources (million gallons per day)		# of wells	Well production capacity (gallons per day)	Estimated water resources used	
	Average Rainfall	Drought Rainfall			Average	Drought
Chuuk (Weno)	3.2	2.32	32	1,600,000	50%	69%
Kosrae	2.62	1.01	4	331,000	13%	33%
Pohnpei (Kolonía area)	6.9	4.60	11	700,000	10%	15.2%
Yap Proper	2.4	1.56	13	900,000	37%	58%
TOTAL	15.12	9.49	60	3,531,000	23%	37%

Source: SPREP (n.d.) Pacific Water Consultations, p. 58

Available data indicate that on the main islands, the existing water harvest systems utilize 23% of available water during periods of average rainfall and 37% during periods of drought. This, however, varies among locations (Table 2.7-7) with Weno (Chuuk) approaching and sometimes exceeding, capacity utilization during severe droughts.

The outer islands have a different situation altogether. Normal household water needs are typically supplied by 1200 gallon rainwater catchment tanks draining a roof area that averages 250 square feet. During normal rainfall, tanks hold approximately 17 days of water supply for a typical household but in times of drought, this shrinks to 3.3 days and may approach 0 days during severe El Nino events (SPREP, n.d). During drought, households use wells drilled into the freshwater lens which also shrinks during drought and is subject to both surface contamination and saltwater intrusion. Human hardship and sometimes serious water-related health problems arise during droughts.

Target 7-B. Biodiversity

Reduce biodiversity loss and by 2010, achieve a significant reduction in the rate of loss.

This target has two indicators: (a) proportion of terrestrial and marine areas protected; and (b) proportion of species threatened with extinction.

Protected Areas. Following an extensive nation-wide consultation process, a “Blueprint for Conserving Biodiversity...” was developed in 2003. The Blueprint identified 53 conservation targets (Table 2.7-9) which captured the breadth of biodiversity found in the FSM including: major ecosystems (12); natural communities (6); special ecological features (4); and rare or endangered species (31). Based on these targets, 130 Areas of Biological Significance (ABS) were identified of which 24 (49%) were designated as high priority sites for protection. Given limited government resources, the wide geographic dispersal of the islands, and the concentration of land ownership and marine use rights in private (family and clan) hands, the decision was made to build a strategy based on community-led resource management assisted by government but avoiding insofar as possible government-led interventions.

Table 2.7-8. Protected Areas 2010 (Source: FSM Department of Resources & Development)				
State	Class	Total HA	Conservation Target (HA)	% of Area Under Protection
Chuuk	Marine	1,712,232	513,670	2%
	Terrestrial	12,362	2,472	17%
Kosrae	Marine	13,542	4,063	3%
	Terrestrial	11,186	2,237	12%
Pohnpei	Marine	122,289	36,687	27%
	Terrestrial	38,124	7,625	19%
Yap	Marine	416,060	124,818	10%
	Terrestrial	11,916	2,383	0%
National	Marine	2,264,123	679,238	6%
	Terrestrial	73,588	14,717	15%

Note: Area under protection includes only main islands and surrounding in-shore marine areas

Because states control the management of land and in-shore resources (to 12 miles off-shore), it is the state governments, working closely with local and international NGOs and resource owners that have been most active in moving the conservation agenda forward. Using the Micronesia Challenge 30% (nearshore marine) and 20% (terrestrial) targets as the benchmark for this MDG indicator, the FSM status against goal is shown in Table 2.7-8. Nationally, the FSM has 5% of near shore marine area and 23% of terrestrial area under some type of protection/sustainable management regime. This represents 18% and 115% respectively of the Micronesia Challenge target.

Table 2.7-9. Conservation Targets for Micronesia

TERRESTRIAL ECOLOGICAL SYSTEMS	TERRESTRIAL SPECIES
<ul style="list-style-type: none"> • Atoll Forest-Beach Strand Complex • Fern-Sedge Savanna • Limestone Forest • Montane Cloud Forest • Riparian Forest • Swamp Forest • Mixed Broadleaf Forest 	<ul style="list-style-type: none"> • Arno skink (<i>Emoia arnoensis arnoensis</i>) • Caroline Island ground dove (<i>Gallicolumba kubaryi</i>) • Chuuk flying fox (<i>Pteropus insularis</i>) • Chuuk greater white-eye (<i>Rukia rukia</i>) • Chuuk monarch (<i>Metabolus rugensis</i>) • Chuuk poison tree (<i>Semecarpus kraemeri</i>) • Cicadabird (<i>Coracina tenuirostris</i>) • Giant Micronesian gecko (<i>Perochirus scutellatus</i>) • Gray duck (<i>Anas superciliosus</i>) • Kosrae flying fox (<i>Pteropus mariannus ualrus</i>) • Long-billed white-eye (<i>Rukia longirostra</i>) • Micronesian pigeon (<i>Ducula oceanica</i>) • Micronesian pigeon var. Truk (<i>Ducula oceanica teraokai</i>) • Micronesian swiftlet (<i>Collocalia inquieta</i>) • Mortlocks flying fox (<i>Pteropus phaeocephalus</i>) • Pohnpei flying fox (<i>Pteropus molossinus</i>) • Pohnpei Island skink (<i>Emoia ponapea</i>) • Pohnpei mountain starling (<i>Aplonis pelzelni</i>) • Pohnpei short-eared owl (<i>Asio flammeus ponapensis</i>) • Pohnpei tree snail 1 (<i>Partula emersoni</i>) • Pohnpei tree snail 2 (<i>Partula guamensis</i>) • Polynesian sheath-tailed bat (<i>Emballoneura semicaudata</i>) • Ulithi flying fox (<i>Pteropus mariannus ulithiansis</i>) • White-throated ground dove (<i>Gallicolumba xanthonura</i>) • Yap flying fox (<i>Pteropus mariannus yapensis</i>) • Yap monarch (<i>Monarcha godeffroyi</i>)
TERRESTRIAL NATURAL COMMUNITIES	
<ul style="list-style-type: none"> • Atoll Inland Mangrove • Clinostigma Palm Forest • Coastal Freshwater Marsh • Ivory Nut Palm Forest • Montane Perched Freshwater Marsh • Terminalia/Nypa Swamp Forest 	
MARINE & COASTAL ECOLOGICAL SYSTEMS	
<ul style="list-style-type: none"> • Atoll Nearshore Marine • Estuary • High Island Nearshore Marine • Mangrove Forest 	
FRESHWATER AQUATIC ECOLOGICAL SYSTEMS	
<ul style="list-style-type: none"> • Freshwater Streams and Rivers 	
SPECIAL ECOLOGICAL FEATURES	
<ul style="list-style-type: none"> • Giant Clam Concentration Areas • Turtle Nesting Beaches • Seabird Nesting Areas • Grouper (Serranidae Family) Spawning • Aggregation Areas 	
MARINE SPECIES	
<ul style="list-style-type: none"> • Coconut crab (<i>Birgus latro</i>) • Manta ray (<i>Manta birostris</i>) • Napoleon wrasse (<i>Cheilinus undulatus</i>) 	<ul style="list-style-type: none"> • Pohnpei river goby (<i>Lentipes sp. A</i>) • Pohnpei river goby (<i>Sicyopterus eudentatus</i>)

Source: TNC (2002). *A Blueprint for Conserving the Biodiversity of the FSM*, p. 20.

Threatened Species: There is no definitive list of Micronesian species that are threatened, vulnerable, or endangered. The FSM Endangered Species Act is a carryover from the Trust Territory administration. It sets out procedures for declaring a species to be endangered but with only a few exceptions (e.g. blue whale, sperm whale, and dugong) leaves the identification of species up to the Department of Resources and Development; the Department has not published an updated list of endangered species. Several external agencies (IUCN, CITES, and US EPA) maintain listings of threatened, vulnerable, or endangered species – some based on FSM-specific data; others based on global data.

Table 2.7-10. Vulnerable, Threatened, and Endangered Species of the FSM

Mammals	<ul style="list-style-type: none"> • 1 family (Fruit bats – Pteropodidae) • 7 sub-species of fruit bats found only in the FSM • Whales includes all species found in the FSM • Dugong is included in the FSM registry but this is an artifact from the TTPI registry; dugongs are resident only in Palau, although there have been reported sightings in Yap of presumably non-resident individuals
Birds	<ul style="list-style-type: none"> • 2 species known to be extinct (Kosrae Crake or <i>Porzana tabrensis</i>; Kosrae Starling or <i>Aplonis corvine</i>) • 2 critically endangered (Pohnpei mountain starling and Chuuk/Faichuk white-eye) • 8 other species vulnerable, threatened or endangered
Reptiles	<ul style="list-style-type: none"> • All four species of sea turtles found in the FSM • Crocodiles (although not common in the FSM) • Monitor lizards
Crustaceans	<ul style="list-style-type: none"> • Coconut crab is listed by IUCN as “data deficient” but important in the FSM and known to be vulnerable
Molluscs (land snails)	<ul style="list-style-type: none"> • Three species native to the FSM are listed by the IUCN
Terrestrial plants	<ul style="list-style-type: none"> • 3 groups • 7 specific species
Marine species	<ul style="list-style-type: none"> • Bumphead parrotfish (<i>Bulbometapon muricatum</i>) • Wrass (<i>Cheilinus undulates</i>) • Giant clam all species may be vulnerable but <i>Tridacna gigas</i> is locally extinct and <i>Hypopopus hypopopus</i> is endangered; both are native, neither endemic; efforts to reseed the reefs with these species are in progress

Sources: Falanruw, M. (2002). *Terrestrial Biodiversity of the FSM*; Edwards, A. (2002). *Marine Biodiversity of the FSM*.

IUCN is the International Union for the Conservation of Nature and Natural Resources; IUCN maintains a well respected “red book” of globally threatened species. The Convention on International Trade in Endangered Species of Wild Fauna and Flora (CITES) is an agreement of 130 nations to protect imperiled species. CITES provides protection to 5,000 species of animals and 25,000 species of plants including a number of FSM resident/native/endemic species. Although not a party to CITES, the FSM is obliged to take steps that prevent international trafficking in any species listed by CITES. In addition to these two international “lists”, the US EPA also maintains an endangered species registry that now contains 1,802 species including several found in the FSM.

A detailed list of FSM species that appear on one or more of the endangered species registries is provided by Falanruw (2002) in her stocktake in support of the NBSAP with additional information provided by Edward (2002) based on his marine environment stocktake. A summary of the Falanruw-Edwards information is presented in Table 2.7-10. Clearly this list is highly incomplete. Any species endemic to the FSM must be classified as vulnerable simply by its sole residence being a single remote Pacific island (or group of islands). Falanruw has called for urgent scientific research to begin to identify locally vulnerable populations and develop a FSM-specific scientifically-grounded endangered species database preliminary to a scientific monitoring system.

Target 7-C. Water and Sanitation

By 2015, halve the proportion of the population without sustainable access to improved drinking water and sanitation.

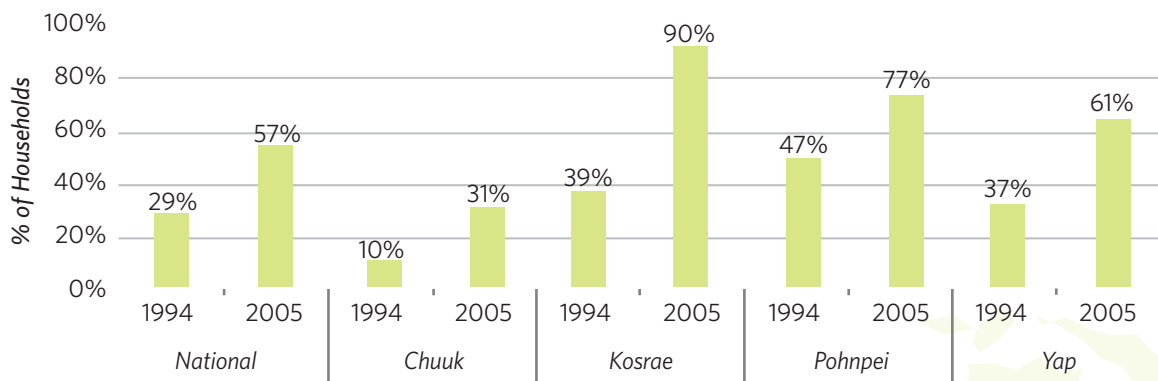
Target 7-C has only two indicators: (1) proportion of the population using an improved drinking water source; and (2) proportion of the population using an improved sanitation facility.

The definition of “improved” has been left to the discretion of individual countries. In the FSM “improved” water supply is defined as a public or community system while “improved” sanitation is defined as connection to a public sewer or private septic system. Neither definition of “improved” can be equated with “safe.” Very few public or community water systems consistently produce treated water that meets any generally recognized safe drinking water standard. Very few public sewerage systems provide adequate treatment of effluent prior to discharge into in-shore waters.

Water Systems.⁶² On the high islands of the FSM, the majority of the public’s water supply comes from surface water (rivers and individual roof catchments) or fresh-to-brackish groundwater (springs and shallow hand-dug wells). In several places groundwater from deep drilled wells (bores) is also available. In the outlying islands and along the coastal fringes of the main islands, rainwater catchments provide the bulk of potable water supplemented by water drawn from freshwater lens. There are approximately 70 public or community water systems in the FSM. Of these, only 5 serving the main islands feature any type of treatment and even here, water is not consistently “safe” due to inadequate system maintenance and irregular supplies. The most recently available data from the 2005 HIES indicates 57% of FSM households have access to “improved” water supplies. This represents a significant increase over the 1994 baseline when 29% of households had access to safe water (Figure 2.7-1).

Figure 2.7-1. FSM Households with Improved Water Supply, 1994 and 2005

Source: Census data (1994); HIES data (2005)



⁶² All information in this section that describes the public water systems in the FSM is drawn from SPREP (n.d.). Pacific Water Consultations.

Figure 2.7-2. Households with Improved Sewage Disposal, 1994 and 2000
 (Source: Census Data)

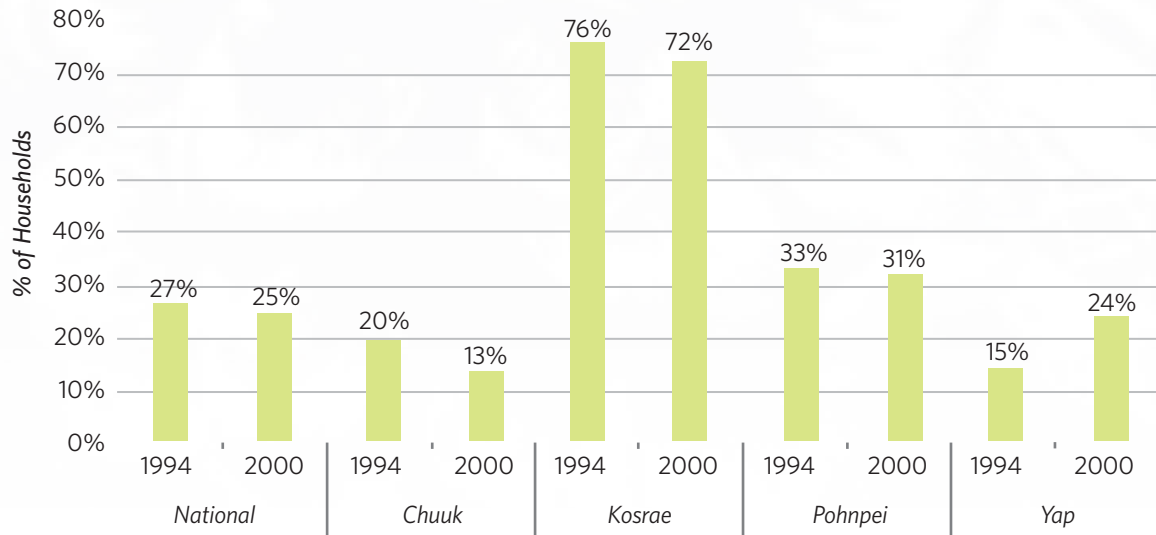
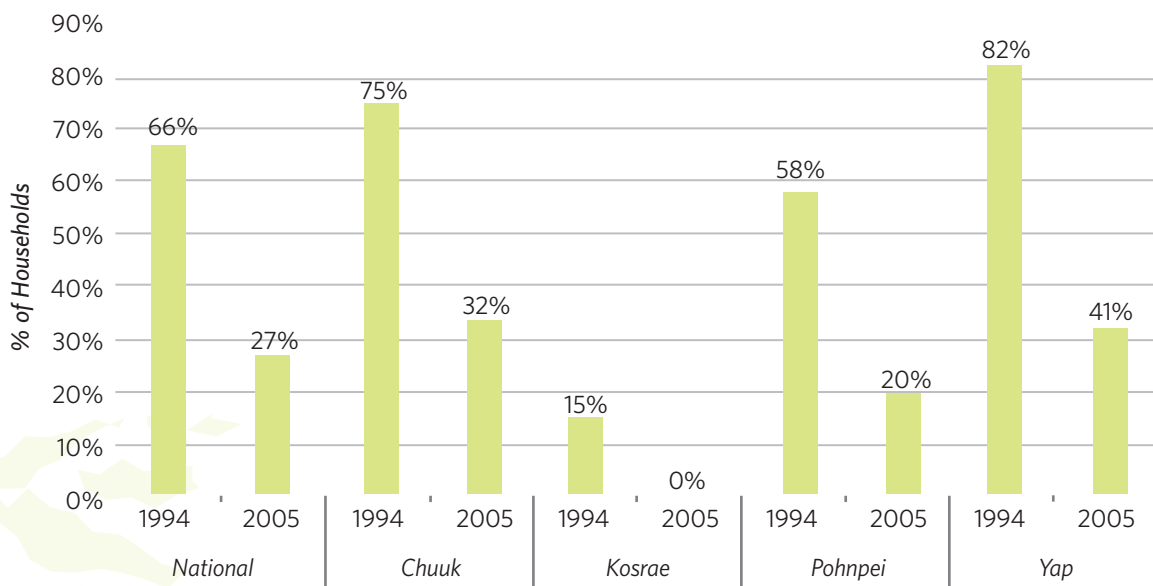


Figure 2.7-3. Households without Toilet Facilities
 Source: Census Data (1994; HIES Data (2005))



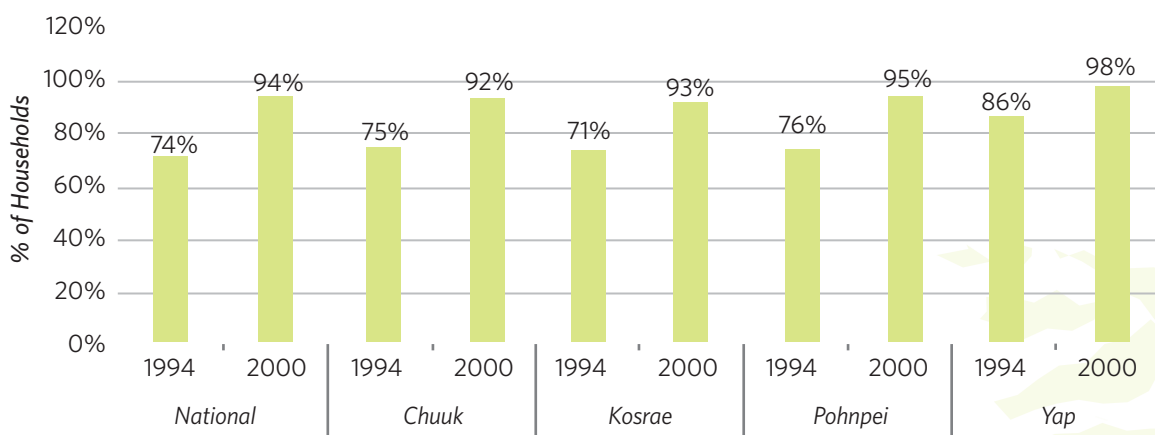
Sanitation. There are now five public sewerage systems, serving Kolonia Town (Pohnpei), Weno Island (Chuuk), Colonia (Yap), and Lelu and Tofol (Kosrae). The Chuuk and Lelu systems pump raw sewage directly into the lagoons without treatment. The other systems provide primary treatment before discharge. Between 1994 and 2000, the latest available data, the proportion of households with access to “improved” sanitation actually declined in all states except Yap with a significant drop evidenced in Chuuk (Figure 2.7-2).

Although the focus of the global indicator is sewage disposal, in some parts of the FSM, having any type of toilet, including an unimproved pit latrine, represents a significant improvement in sanitation and hygiene. Although the 2005 HIES shows that a more than a quarter of number of households – especially in Chuuk and Yap outlying islands – still have no toilets, there has been a significant improvement at this most basic level of sanitation. In 1994, 66% of households nationwide had no toilet facilities.

Other Sanitation Issues. Although the MDGs set no target or indicator for solid waste disposal, it is worth noting that solid waste is a major environmental issue throughout the FSM and an important source of in-shore marine pollution. There are several public dumpsites throughout the FSM, but most are not properly located or constructed and maintenance is minimal or non-existent. Households and commercial establishments transport their own waste to the public dumpsites, a practice that encourages illicit dumping. The critical deficiencies in the area of solid waste collection and disposal constitute one of the leading environmental problems in the FSM (SPREP, n.d).

Other waste disposal issues include the common practice of locating pigpens beside the lagoon or mangroves with untreated animal effluent continuously draining into near-shore waters. In addition, septic tanks are generally poorly constructed and maintained with effluent overflowing during heavy rains. Pour-flush toilets, and benjos (both overwater and overland) are also frequently located adjacent to the lagoon. The environmental and health problems arising from these practices include continuing high rates of diarrheal diseases punctuated by periodic epidemics and are particularly acute in the densely populated, low-income, areas of urban centers.

Figure 2.7-4. Households with Security of Tenure
Source: Census Data



Target 7-D. Urban Poor

By 2020 to have achieved significant improvement in the lives of at least 100 million slum dwellers.

This target has one indicator - the proportion of the urban population living in slums. While some people will argue that the target and indicator is irrelevant in the FSM, there are well recognized neighborhoods within each of the urban centers of the FSM that are locally recognized as substandard (broadly equivalent to slums). These are pockets of generally low-income

households, often immigrants from outer islands, who live on land that is allocated to them on a "grace and favor basis" and whose semi-formal communities are often under-served by water, sewerage and utility systems. Because these households lack security of tenure, housing is often sub-standard. The very existence of these communities may violate local laws or health regulations but because the inhabitants lack alternative places to live, regulators turn "a blind eye." These areas are well-recognized as focal points for health and social problems but there is no actual report on the number of households or people who reside in these areas even though it would be possible to extract this information from raw census data.

Although not specific to urban slums, data are available from census reports that assess security of tenure of households (Figure 2.7-3). While security of tenure provides "peace of mind" for individuals, it is also an important environmental indicator as well. People who have security of tenure are more likely to invest in their home and environment and are have more opportunities to access credit to finance home improvements including those that improve the environment.

FSM and the Region. Of the 15 Pacific Island nations, the FSM and five others are considered to be on-track to achieving MDG 7 targets while four are considered as being "slightly off-track" and four others are "seriously off-track" (UNDP-PIFS, 2010)

2015 and Beyond. As in all Pacific nations, population growth, rising levels of poverty, and development are putting tremendous pressure on FSM's fragile natural resource base. Government, however, is committed to countering these threats and is strongly supported in its efforts by civil society and the international conservation community. Continued progress toward the targets of MDG 7 is anticipated through 2015 and beyond.



Photo courtesy of FSM Information Services

Millennium Development Goal 8 : Forge Global Partnerships

Table 2.8-1. FSM National Indicators at a Glance - MDG 8 Partnerships for Development

Indicator	Base Data		Most Recent Data		2015	Data Source
	Year	Value	Year	Value	FSM Target	
Target 8-A. Develop further an open, rule-based, predictable, non-discriminatory trading and financial system including a commitment to good governance, development, and poverty reduction nationally and internationally.						
ODA (Average per year)	FY95-2003	\$103.2m	FY 04-09	\$92.2m	---	McKinley, et al., 2010
ODA as % of Gross National Income	FY 95	47.7%	FY 09	41.9%	---	
ODA as % of GDP	FY 95	50%	FY 09	45%	---	
ODA allocated to health & education services						
COFA	---	---	FY 04-08	58%	---	Statistical Yearbook 2008
Non-COFA			FY 07-08	29%	---	
Bilateral ODA that is untied	Not Available; 100% COFA funds untied				100%	GAO
Target 8-B. Address the special needs of Least Developed Countries.						
Not applicable to FSM	---	NA	---	NA	NA	NA
Target 8-C. Address the special needs of small island developing states.						
Indicators 8-C.1 - 8-C.4.	Data unavailable to measure as stated; see text.					
Target 8-D. Deal comprehensively with the debt problems of developing countries through national and international measures in order to make debt sustainable in the long term						
Indicators relating to HIPC points are not applicable						
Debt service as a percent of exports	FY 95	57%	FY 06	28%	---	FSM Statistical Yearbook 2008
Debt services as a percent of GDP	FY 95	46%	FY 06	9%	---	
Target 8-E. In cooperation with pharmaceutical companies, provide access to affordable essential drugs in developing countries.						
Population with access to 20 or more of the most essential drugs (%)	---	NAv	---	NAv	100%	See text
Target 8-F. In cooperation with the private sector, make widely available the benefits of new technologies, especially information and communications						
Telephone lines per 1,000	1997	79.2	2007	108.3	---	FSM Statistical Yearbook & FSMTC
Cellular subscribers per 1,000	2003	59.3	2007	213.1	---	
Internet subscriptions per 1,000	1997	2.2.	2006	15.8	---	

Section 2.8.

MDG 8. Forge Global Partnerships

Introduction. Forging global partnerships in support of MDGs 1-7 is the focus of 4 of the 6 targets and 12 of the 16 indicators under MDG 8. Three forms of global partnerships are specifically highlighted: official development assistance (ODA); market access; and debt relief. Two additional targets under MDG 8 address access to pharmaceuticals and information technologies.

Target 8-A. Partnerships for Development

Develop further an open, rule-based, predictable, non-discriminatory trading and financial system.

MDG 8-A is supported by five indicators, four relevant to the FSM: ⁶³

- Official Development Assistance (ODA);
- ODA as a proportion of gross national income.
- ODA allocated to basic social services (basic education, primary health care, nutrition, safe water and sanitation);
- Bilateral ODA that is untied.

Background. Recognizing the critical role that ODA plays in helping many nations progress toward the MDGs, a series of global conferences have explored the roles and responsibilities of donors and recipients in the aid relationship. In Monterrey (2002), Rome (2003), Paris (2005), and Accra (2007), donors and recipients have agreed to:

- A net increase in total ODA;
- A redirection of ODA in support of the MDGs;
- New principles for enhancing aid effectiveness.

These global principles (Text Box 8-1) are reiterated in the Pacific Principles on Aid Effectiveness (2007) and the Cairns Compact for Strengthening Development Cooperation in the Pacific (2009). Although not a party to the global agreements, FSM is a party to both regional agreements.

Official Development Assistance. FSM depends heavily on ODA to finance recurrent expenditures and infrastructure. In FY 2009, official figures show FSM received US\$123.5 million in ODA⁶⁴ of which US\$73.3 million was COFA funding (59% of the total). The balance of non-COFA ODA includes: non-COFA U.S. grants, bilateral assistance (Australia, China, European Union, Japan, etc), and multilateral assistance (United Nations agencies, regional agencies, Asian Development Bank and others). Table 2.8-2 and Figure 2.8-1 show trends in ODA for the period FY 1995-2009. Comparison can be drawn between two periods, the waning years of COFA I (FY 95-03) and the start-up of COFA II (FY 04-09).

Comparing the average of the two periods, local revenues increased (+8%), COFA revenues declined (-27%), and non-COFA ODA increased (+78%) with much of this increase attributable to a sharp jump in non-COFA ODA in FY 2009. These are positive trends indicating some movement toward financial sustainability and diversification of ODA sources away from the U.S. Significant acceleration, however, will be necessary if the FSM is to be positioned for financial independence by the end of COFA II in 2023.

Table 2.8-2. Consolidated Government Revenues (Local and ODA)
Millions US Dollars

	Average Local Revenue	Average ODA	Average Revenue (Local & ODA)	Average COFA	Average Non-COFA ODA	COFA as % of Total ODA
FY 95-03	\$51.6	\$103.2	\$154.8	\$86.5	\$16.7	83.8%
FY 04-09	\$55.7	\$92.9	\$147.9	\$63.1	\$29.8	67.9%

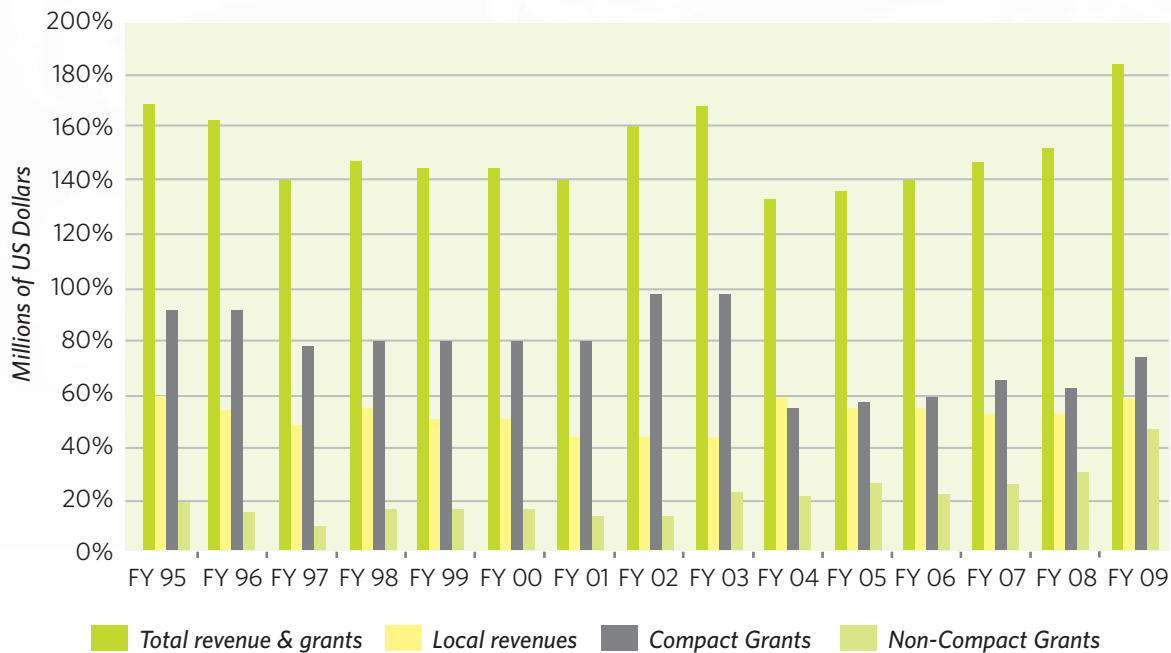
Source: McKinley, et al., 2010.

⁶³ The fifth indicator is specific to landlocked countries.

⁶⁴ The totals here are under-estimated as they do not include ODA that does not involve a cash disbursement to or through government (e.g. ODA administered directly by donors; in-kind technical or material support; and ODA to NGOs not channeled through government).

Figure 2.8-1. Consolidated Government Revenue FY95-09

Source: McKinley, et al., 2010



Text Box 8-1. Principles for Effective Development Assistance

Paris Declaration on Aid Effectiveness

Five underlying principles

- Principle 1. Ownership** – developing countries exercise leadership over their development policies and strategies and are responsible for coordinating development activities;
- Principle 2. Alignment** – donors should align their assistance with nationally-owned development strategies, institutions, and procedures;
- Principle 3. Harmonization** – donors actions are to be harmonized, transparent, and collectively effective;
- Principle 4. Managing for results** – resource management and decision-making to be improved in order to enhance development impact and results;
- Principle 5. Mutual accountability** – both governments and their donor partners are mutually accountable for development results.

Accra Declaration

Additional Principles

- Principle 6. Predictability** – donors will provide 3-5 year forward information on their planned aid to partner countries.
- Principle 7. Country systems** – developing country systems will be used to deliver aid as the first option rather than donor systems.
- Principle 8. Conditionality** – donors will switch from prescriptive conditions about how and when aid money is spent to conditions based on the developing country's own development objectives.
- Principle 9. Untying** – donors will relax restrictions that prevent developing countries from buying the goods and services they need at the best price on the domestic or international market.

Of the five governments comprising the FSM, the national government is the least aid-dependent (average 45% of government revenues derived from ODA). The level of dependency is much higher among the states: Chuuk (80%); Kosrae (79%); Pohnpei (68%); and Yap (67%).⁶⁵

ODA, GDP, GNI. While government, fueled by ODA, remains the largest contributor to GDP, government's share of GDP has declined since the start of COFA II (Figure 2.8-2). Figure 2.8-3 shows ODA as a proportion of GDP. Figure 2.8-4 shows ODA as a proportion of Gross National Income (GNI).⁶⁶

ODA Allocated to Basic Services. In accordance with international and regional agreements that place the MDGs at the center of the donor-partner dialogue, MDG 8 encourages countries to monitor the distribution of ODA among sectors especially relevant to achieving the MDGs and alleviating poverty, namely: health (MDG 4, 5, and 6); education (MDG 2); and water and sanitation (MDG 7).

Figure 2.8-2. Gov't Revenues as % of GDP

Source: McKinley et al., 2010

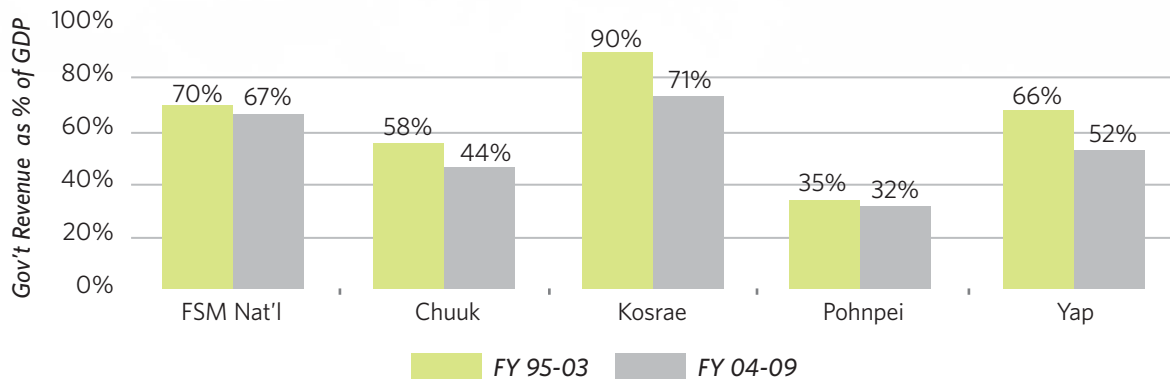
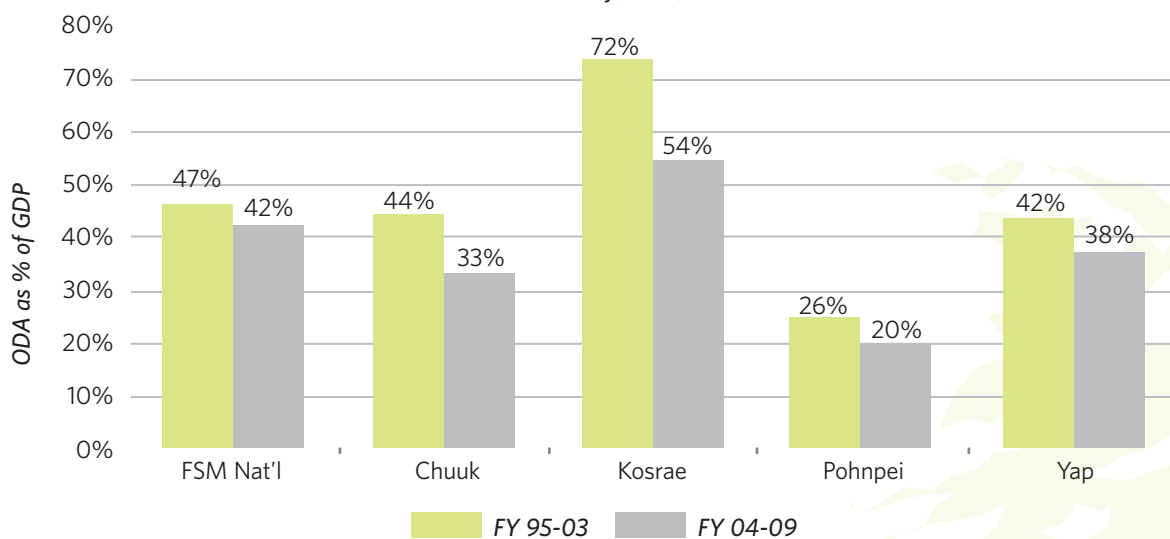


Figure 2.8-3. ODA as % of GDP

Source: McKinley, et al., 2010

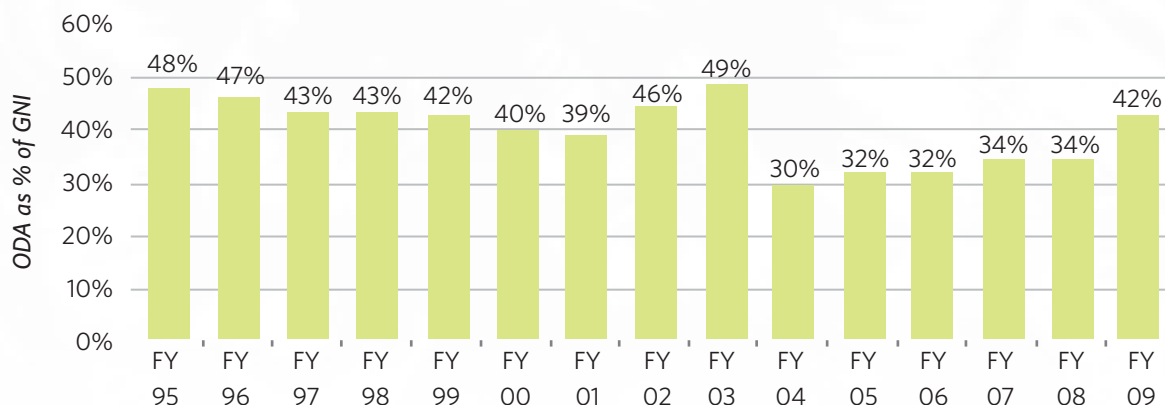


⁶⁵ Reference period FY 95-09; source McKinley, et al, 2010.

⁶⁶ GNI is equal to GDP (which represents the final result of the production activity of resident producer units) less primary incomes payable to non-resident units plus primary incomes receivable from non-resident units. GNI is equal GDP less taxes (less subsidies) on production and imports, compensation of employees and property income payable to the rest of the world plus the corresponding items receivable from the rest of the world.

Figure 2.8-4. ODA as % of Gross National Income

Source: McKinley, et al., 2010



The major source of ODA for the FSM is the United States Government through COFA. COFA I, (1987-2003) provided budgetary and infrastructure support valued at approximately \$2.3 billion (United States GAO, 2008). COFA II (2004-2023) will provide an estimated \$1.5 billion in sector-specific assistance and capitalization of a Trust Fund. Six sectors are the beneficiaries of sector-specific funding: education, health, environment, public sector capacity building, private sector development, and infrastructure; priority is given to education and health (Table 2.8-3). According to the Amended Compact, not less than 30 percent of the annual grant assistance provided under the COFA shall be invested in infrastructure. COFA funding for infrastructure also prioritizes MDG-related basic services (schools, clinics, water and sanitation facilities).

Bilateral ODA that is Untied. In this context, “untied” refers to the ability of recipient countries to use ODA to purchase goods and services domestically or internationally at the most favorable prices rather than being restricted to purchasing goods and services from the donor country. COFA funds (COFA I and II) are generally untied. Under COFA II, there is more stringent oversight of use of funds by a joint committee appointed by the U.S. and FSM governments (“JEMCO”). There is, however, no requirement that funds be used to purchase goods and services only in the FSM or the United States. Since the bulk of these funds are used to purchase goods and services within the FSM, these restrictions do not constitute a significant constraint on utilization. Data are not available on the proportion of non-US ODA that is untied.

Table 2.8-3. ODA (%) Allocated to MDG Related Sectors

	COFA Sector (Average FY 04-09)	Non-COFA (Average FY 07-08)
Health	23%	12.7%
Education	35%	16.1%
Environment	2%	1.9%
Public sector	9%	2.5%
Private sector	4%	1.5%
Infrastructure	27%	63.5%
Other NEC	0%	2.0%

Sources: COFA: McKinley, et al., (2010). FSM FY 08 Statistical Tables (draft). Non-COFA: SBOC data base July 2010.
Note that non-COFA infrastructure allocations are buoyed by large allocations by the US Federal Aviation Authority for airport upgrading in Pohnpei, Kosrae, and Yap.

Target 8-B. Least Developed Countries

Address the special needs of the least developed countries. This includes tariffs and quota free access for the least developed countries’ (LDCs) exports; enhanced program of debt relief for heavily indebted poor countries (HIPC) and cancellation of official bilateral debt, and more generous ODA for countries committed to poverty reduction

FSM is not a Least Developed Country. Target 8-B and its supporting four indicators are not applicable to the FSM.

Target 8.C: Special Needs of Small Islands

Address the special needs of landlocked countries and small island developing States (through the Program of Action for the Sustainable Development of Small Islands Developing States and the outcome of the twenty-second special session of the General Assembly).

Target 8-C has four indicators, all addressing trade issues.

- Proportion of total developed country imports (by value excluding arms) from developing countries and least developed countries that are admitted free of duty;
- Average tariffs imposed by developed countries on agricultural products, clothing, and textiles from developing countries;
- Agriculture support for Organization of Economic Cooperation and Development (OECD) countries as a percentage of gross domestic product;
- Proportion of ODA allocated to building trade capacity.

The first two indicators are not directly relevant to the FSM; indicators 3 and 4 are relevant although information is not available to precisely measure as stated. COFA funds allocated to agriculture and trade support fall generally under the private sector development grant which has received a mere 4% of COFA allocations FY 2004-2009 (Table 2.8-3). For non-COFA ODA, agriculture and forestry combined received 1.4% of funding (FY 07-08). Precise figures are unavailable but direct investments in trade capacity are also a very small portion of the total. The productive sectors, however, benefit indirectly from investments underway in communications, transportation, and energy infrastructure (e.g. the fiber optic cable, airport development, and renewable energy technologies).

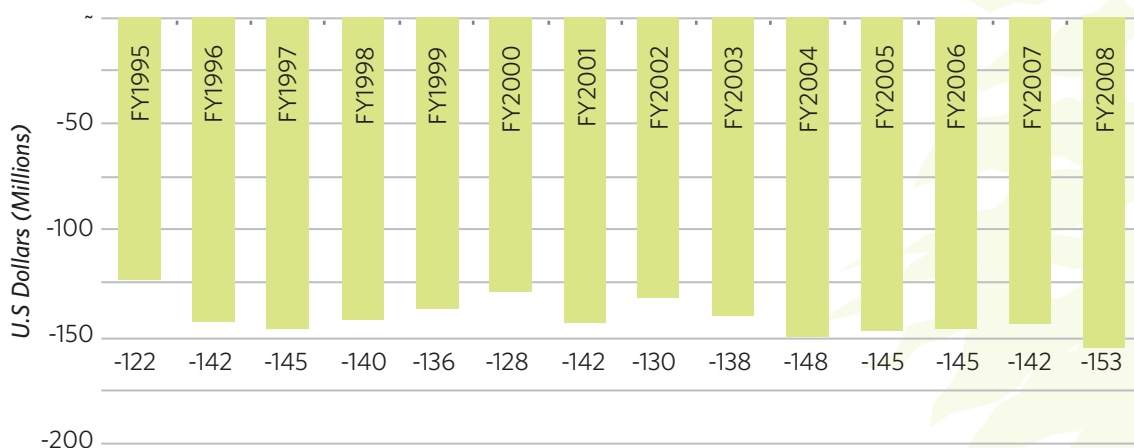
Trade Status. FSM's trade performance has been weak resulting in an unfavorable balance of trade (Figure 2.8-5). Food and beverages dominate imports representing about 30% of the total. Fish is the main export commodity accounting for about 69% of the total. Other export products include sakau (kava), citrus, betel nuts, and root crops. The main import markets are the US, Guam, Singapore, Japan and Hong Kong. The main export markets are Guam, Japan, US Mainland, the Commonwealth of Northern Mariana Islands (CNMI), Japan and the Republic of the Marshall Islands (RMI).

Services contribute about 77% to the GDP but exports of services are very low. The main services export is tourism which remains underdeveloped. Another potential source of 'exports' is the temporary movement of persons abroad. Technical and financial assistance are needed to upgrade the FSM's training institutions to develop skills that are needed to turn around the economy and export surplus skills (see MDG 2).

COFA allows duty-free access to the U.S. market for goods meeting rules of origin (at least 35% local content). Quarantine requirements, however, are a major constraint to maximizing use of this facility. Together with the RMI and Palau, FSM is a member of the Micronesian Trade Commission which seeks to expand trade within the Micronesian sub-region. FSM has also initiated actions to ratify the Pacific Island Countries Trade Agreement (PICTA) which, among other objectives, seeks to create a free trade zone among the developing countries of the Pacific Region.

Figure 2.8-5. Goods and Services Balance

Source: McKinley, et al., (2010)



FSM has access to the Australian and New-Zealand market via the South Pacific Regional Trade and Economic Cooperation Agreement (SPARTECA). Market access, however, is hampered by transportation constraints and burdensome rules of origin, quarantine and phytosanitary requirements. Although not a signatory to the Pacific Agreement on Closer Economic Relations (PACER) between Forum Island Countries (FICs) and Australia and New Zealand, FSM is participating with the other FICs in discussions around PACER Plus.

Outside the region, Asia is an important market for the FSM, with Japan being the major export market for fish and tourism. China is also becoming an important aid partner and possibly in the future, source of foreign direct investment (FDI). China is also a potential export market. FSM, along with 13 Pacific nations, is negotiating an Economic Partnership Agreement (EPA) with the European Commission (EC). Of particular importance, the EU represents a potential market for the FSM fisheries industry.

A national trade policy was drafted in 2008 (still being finalized) and a National Trade Facilitation Board established under the leadership of the Vice-President. Priority export sectors are agriculture, fish, and tourism. Key objectives include: creating an environment which is conducive for investment and private sector development; addressing supply-side constraints and non-tariff barriers; promoting import substitution and exports of value added goods and services; guiding the nation in trade negotiations and in implementing trade agreements; using the Trade Policy to secure Aid for Trade from FSM's trading partners and donors; and promoting export-led sustainable economic growth, with the ultimate objective of raising the standards of living in the FSM.

To implement the policy, higher levels of investment in private sector and trade development will be needed. As noted, the proportion of ODA directed toward the private sector is relatively small and the FSM has had limited success to-date in attracting foreign direct investment, possibly due to restrictive laws and regulations governing FDI. A concern voiced by some FSM government officials during consultations on this report is that the high priority given to education and health under COFA II precludes adequate funding of private sector and trade development. This is not only a constraint to economic development but could undermine the long-term sustainability of the health and education gains achieved as a result of COFA II funding.



Photo courtesy of FSM Information Services

Table 2.8-4. Overview of Mauritius Strategy

Chapter 1	Climate change
Chapter 2	Disasters
Chapter 3	Wastes
Chapter 4	Coastal & marine resources
Chapter 5	Freshwater resources
Chapter 6	Land resources
Chapter 7	Energy resources
Chapter 8	Tourism resources
Chapter 9	Biodiversity resources
Chapter 10	Transport & communications
Chapter 11	Science & technology
Chapter 12	Graduation from LDC status
Chapter 13	Trade
Chapter 14	Education
Chapter 15	Production & consumption
Chapter 16	Enabling environments
Chapter 17	Health
Chapter 18	Knowledge & information
Chapter 19	Culture
Chapter 20	Implementation

Addressing the Special Needs of Islands. The 44th U.N. General Assembly recognized the special vulnerability of islands and called for action to address the adverse effect of climate change and sea level rise (Resolution 44/206, 1989). Subsequently, the special situation of islands was highlighted during deliberations at the "Rio Earth Summit," the ensuing Agenda 21 calling for a separate conference to focus exclusively on the unique situation of islands. The first Global Conference on the Sustainable Development of Small Island States was subsequently convened in 1994 in Bridgetown, Barbados. Attended by 125 states and territories, including 46 small islands, the conference produced the Barbados Program of Action on the Sustainable Development of SIDS (BPOA), a fourteen-point program addressing island-specific vulnerabilities.

A follow-up meeting in Mauritius (2005) reviewed progress toward the Barbados Program of Action. The resulting Mauritius Strategy for Implementation (MSI) expanded the Barbados program into a twenty-point agenda that integrates three pillars of development - social, economic, and environmental (Table 2.8-4).

The FSM has recently completed a review of progress toward the Mauritius Strategy. The review was tabled at a Pacific Regional Review Meeting (February, 2010) in Port Vila preliminary to a global review to be held at the United Nations in September 2010.

Implementation of the Mauritius Strategy requires national commitment, regional and international partnerships, stakeholder participation, and the provision of financial resources and technical assistance through ODA and

FDI. Although constraints and challenges remain, the list of initiatives taken or in progress to address island vulnerabilities is impressive. Recent achievements include: strengthening the effectiveness and viability of national tuna industries; improved shipping services, ports and associated administration standards; facilitating negotiations for the bulk procurement of petroleum; developing regional standards for literacy, numeracy and life skills; establishing the Pacific HIV Response Fund; facilitating trade negotiations and regional trade agreements (SPARTECA, PICTA and PACER); strengthening the regional response to climate change; developing national energy policies and securing ODA funding for renewable energy development (solar, wind, hydro, and bio-fuel); strengthening biodiversity protection with special emphasis on expanding national and regional networks of protected areas; and reducing disaster vulnerabilities and strengthening early warning systems and response capabilities.⁶⁷



Photo courtesy of FSM Information Services

⁶⁷ The list of national and regional initiatives that address the vulnerabilities of the developing Pacific Island nations is too lengthy to be summarized adequately in this report. Readers are advised to consult the Regional MSI +5 report: ESCAP-Suva (2010). Sustainable Development in the Pacific: Progress and Challenges. The FSM National report is also available from ESCAP.

Much of the progress in the region can be attributed to the unifying effect of the Pacific Plan. Adopted by Forum leaders in 2005, the plan draws from both the Barbados and Mauritius Programs. It sets out a roadmap for expansion of regional cooperation around what it terms four pillars of development: economic growth; sustainable development (including social development and environmental protection); good governance; and security (Text Box 2.8-2).

Text Box 2.8-2. Overview of the Pacific Plan

Adopted by Forum Island Leaders in October 2005

Vision. Leaders believe the Pacific region can, should and will be a region of peace, harmony, security and economic prosperity, so that all of its people can lead free and worthwhile lives. We treasure the diversity of the Pacific and seek a future in which its cultures, traditions and religious beliefs are valued, honored and developed. We seek a Pacific region that is respected for the quality of its governance, the sustainable management of its resources, the full observance of democratic values and for its defense and promotion of human rights. We seek partnerships with our neighbors and beyond to develop our knowledge, to improve our communications and to ensure a sustainable economic existence for all.

Goal. Enhance and stimulate economic growth, sustainable development, good governance and security for Pacific countries through regionalism.

November 2007

Strategic Objectives.

Economic Growth

1. Increase sustainable trade (including services), and investment
2. Improve efficiency and effectiveness of infrastructure development and associated service delivery
3. Increase private sector participation in, and contribution to, development

Sustainable Development

4. Reduce poverty
5. Improve natural resource and environmental management
6. Improve health
7. Improve education and training
8. Improve gender equality
9. Enhance involvement of youth
10. Increase levels of participation and achievement in sports
11. Recognize and protect cultural values, identities and traditional knowledge

Good Governance

12. Improve transparency, accountability, equity and efficiency in the management and use of resources

Security

13. Improve political and social conditions for stability and safety

Target 8-D. Debt

Deal comprehensively with the debt problems of developing countries through national and international measures in order to make debt sustainable in the long term

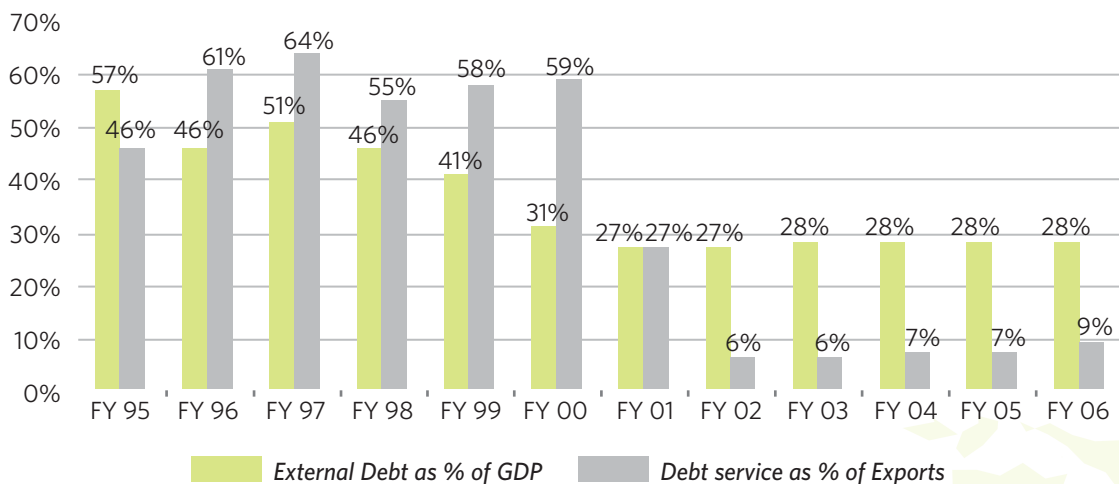
Target 8-D has three indicators:

- Total number of countries that have reached their HIPC decision points and number that have reached their HIPC completion points (cumulative);
- Debt relief committed under HIPC and MDRI initiatives;
- Debt service as a percentage of exported goods and services.

FSM is not a "Highly Indebted Poor Country" so targets relating to HIPC are not applicable. Targets relating to debt management are applicable.

National Debt. Until 1990, the FSM had no significant external debt. In the early 1990's borrowing increased rapidly to fund portfolio investments by Yap State and fisheries sector investments (vessels and infrastructure) in Pohnpei, Chuuk, and Kosrae. Public guaranteed borrowing also included telecommunications loans (\$41 million) from the U.S. Rural Electrification Administration and borrowing by the Yap Fishing Corporation (\$9 million). By the end of FY 93, external debt totaled \$137 million representing 68% of GDP. This level of debt was a serious threat to financial stability. Using Compact revenues, by FY 2001 the backlog of debt had been cleared. Subsequently, FSM borrowing has been limited to concessional loans, primarily from the Asian Development Bank, to financial public sector reform (early retirement of civil servants), water and sanitation development, and a fisheries project. FSM's total debt is now relatively low in comparison to other Pacific Islands countries and is considered to be sustainable (Figure 2.8-6).⁶⁸

Figure 2.8-6. External Debt and Debt Service
Source: FSM Statistical Yearbook 2008, Table 6.9



⁶⁸ The commentary on debt is taken entirely from the FSM Strategic Development Plan 2004-2023, (Vol. I).

Target 8-E. Pharmaceuticals

In cooperation with pharmaceutical companies, provide access to affordable essential drugs in developing countries.

Target 8-E has only a single indicator - proportion of the population with access to 20 or more of the most essential drugs at affordable prices. It is difficult to assess progress against this indicator as written because it requires that multiple attributes be defined and measured. Chief among these is identification of the 20 MOST essential drugs that meet the needs of the majority of the population. While the FSM has an essential drug formulary,

this contains more than 20 drugs. There has been, as yet, no effort to identify the 20 most essential drugs from this list and assess their availability, accessibility, and affordability across the country.

It is the policy of the FSM Government to provide citizens with essential primary health care, including drugs, on a subsidized basis. Although nominal charges are assessed for many health services, no one is denied care due to inability to pay. While a system of primary health care based on a network of rural dispensaries has been established, drug supplies have been identified as a pervasive constraint to delivery of quality health care in all settings (hospitals and dispensaries). Although the shortage of drugs in Chuuk is particularly acute, the problem is national in scope (United States GAO, 2007).

The FSM has established partnerships with the U.S. Centers for Disease Control (CDC), UNICEF, WHO, UNFPA, and SPC to support vaccines, contraceptive commodities, some drugs and reagents used to diagnose and treat HIV/AIDS and certain other conditions. The FSM has not established stable partnerships with the pharmaceutical industry to address the broader drug supply issue.⁶⁹ Despite the fact that this indicator cannot be precisely measured, there is preponderance of evidence that the FSM falls significantly short of meeting this target.

Target 8-F. Information Technologies

In cooperation with the private sector, make available the benefits of new technologies, especially information and communications

Target 8-F measures market penetration of information technologies and has 3 indicators:

- Telephone lines per 1,000 population;
- Cellular subscribers per 1,000 population;
- Internet users per 1,000 population.

Telephone Lines. The number of telephone (fixed) lines per 1,000 population has steadily increased over the past decade although the number is still quite low in Chuuk State (Table 2.8-5A).

Cellular Subscribers. Cellular service was introduced in Pohnpei in 2000. By 2003, cellular service had gone nationwide and has enjoyed rapid growth since (Table 2.8-5B).

Internet Users. The indicator focuses on internet users for which there are no data. Data are only available on internet subscribers, a subset of users (Table 2.8-5C). There was a sharp drop in internet subscriptions between 2006 and 2007. This reflects a crack-down by the FSM Telecommunications Corporation (FSMTC) to cut off delinquent accounts

Table 2.8-5. Telecommunications

Table 2.8-5. Telecommunications					
A. Telephone Lines Per 1,000 Population					
	National	Chuuk	Kosrae	Pohnpei	Yap
1997	79.2	27.4	143.6	128.2	131.9
2000	95.2	34.9	169.8	153.0	153.7
2005	108.3	42.0	198.0	165.9	179.6
B. Cellular Subscribers Per 1,000 Population					
2003	59.6	15.6	52.1	120.5	85.6
2007	213.1	112.5	231.0	310.0	371.3
C. Internet Subscribers Per 1,000 Population					
1997	2.2	3.8	2.1	4.6	3.8
2000	12.8	19.5	22.9	20.9	19.5
2005	15.8	24.2	28.8	25.2	23.2
Sources: A & C: Soram, J. (2009). <i>MDGs in the FSM: Building a way for development (presentation before the MDG Task Force)</i> . B. <i>FSM Statistical Year Book 2008, Table 8.11</i> .					

⁶⁹ "One-off" support is sometimes provided by industry. This type of support is not that which is targeted by the target/indicator.

A more useful indicator of development progress might be proportion of schools and health facilities with internet access. At present, 6 schools in Pohnpei, 6 in Chuuk, and 4 in Kosrae are connected to the internet (6% of total schools), several of these connections funded by the European Union through a Rural Internet Connectivity project (FSM Department of Education, personal communications). Constraints to internet connectivity in schools include: lack of power; high capital costs; and high recurrent costs (\$280 per month per school for dial-up). At present, FSMTC has no policy that allows schools or health facilities subsidized services.⁷⁰

Pohnpei has recently (April 2010) acquired fiber optic cable capacity which greatly improves the speed and reliability of services while reducing operating costs. Government is committed to identifying resources to extend fiber optic services to all four states while at the same time opening the FSM telecommunications market to competition (FSM press release, July 21, 2010).

In September 2010, JEMCO approved a grant of US\$ 360,000 to be spent on the expansion of the Asynchronous Digital Subscriber Line (ADSL) coverage. The project entails an expansion of the existing FSMTC services and provides Internet coverage to 100% of the education and health facilities that have power and copper phone lines on all the main islands. Rural communities will have the opportunity to subscribe to the expanded services as well.

The FSM Telecom proposal to expand the ADSL's services is awaiting Congress appropriation of the funding.

⁷⁰ As part of its program of cooperation with Pacific Island governments, SPC is exploring the feasibility of introducing the "one child - one laptop" initiative in the region.



Section 3. MDGs and the States

- Section 3.1. Introduction
- Section 3.2. Chuuk State
- Section 3.3. Kosrae State
- Section 3.4. Pohnpei State
- Section 3.5. Yap State



Section 3.1.

Introduction





The Federated States of Micronesia is a voluntary federation of four semi-autonomous states each retaining considerable autonomy to manage their domestic affairs and resources, including making external contacts and entering into independent partnership arrangements. Those sectors most closely aligned with the MDGs – namely, health, education, environmental protection, and water and sanitation – fall primarily under the responsibility of state governments. It is therefore important to consider not only the status of the MDGs at the national level, but also at the state level.

To date, state officials and the public at large have had limited exposure to the MDGs. In 2009-2010, the National MDG Task Force convened the first round of state-level meetings; these meetings were primarily for the purpose of introducing the MDGs and the national MDG Capacity Building Project. For most participants, these workshops were their first opportunity to consider the MDGs in depth. Due to limited time, discussions centered on MDG 1 since the concepts of poverty and hardship are sensitive and poorly understood by many citizens.

The process of compiling the first FSM MDG Status Report has been national in focus. Primary data collection has not taken place in the states. For this reason, some relevant data available in the states, but not at the national level, may have been omitted from this report. As work progresses to localize the MDGs, there will be opportunities to correct these omissions.

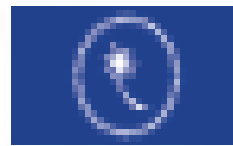
Not all targets and indicators are relevant at the state level. The summary tables prepared for each state represent a sub-set of the global indicators. Table 3.1-1 summarizes the situation in the states.

Table 3.1-1. Overview of State Progress vis-à-vis MDGs

	Chuuk	Kosrae	Pohnpei	Yap
MDG 1 - Poverty	Poverty	Poverty	Poverty	Poverty
	Employment	Employment	Employment	Employment
MDG 2 - Education	Participation	Participation	Participation	Participation
	Quality	Quality	Quality	Quality
MDG 3 - Gender	Education	Education	Education	Education
	Employment	Employment	Employment	Employment
MDG 4 - Child health	Deaths	Deaths	Deaths	Deaths
	Immunization	Immunization	Immunization	Immunization
MDG 5 - Maternal health	Deaths	Deaths	Deaths	Deaths
	Reproductive Serv.	Reproductive Serv	Reproductive Serv	Reproductive Serv
MDG 6 - HIV-AIDS, TB, NCDs	HIV & TB	HIV & TB	HIV & TB	HIV & TB
	NCDs	NCDs	NCDs	NCDs
MDG 7 - Environment	Biodiversity	Biodiversity	Biodiversity	Biodiversity
	Water & Sanitation	Water & Sanitation	Water & Sanitation	Water & Sanitation
MDG 8 - Partnerships toward sustainability	Economic Sustainability	Economic Sustainability	Economic Sustainability	Economic Sustainability
		Progressing toward MDG goal; reasonable expectation of achieving target		Key target unlikely to be achieved by 2015
		Situation stable or moderate progress; possible to achieve key targets by 2015		Inadequate data to accurately gauge progress

Section 3.2.

MDGs and CHUUK STATE



State Overview

Despite a land area of only 49.2 square miles distributed across 542 islets, Chuuk is nevertheless the largest of the FSM states in terms of marine expanse and population (SBOC, 2008). The state is comprised of 7 main island groups, the largest being the densely populated, 800 square mile, Chuuk Lagoon with four island complexes and 98 individual islands. Weno, the state capital, is located within the Chuuk Lagoon. Outside the lagoon, there are three main island groups: Mortlocks, Halls, and Western Islands.

The population of Chuuk in 2000 was 53,595 persons (census data) and in 2010, 48,651 (provisional census), a drop of 9.7%. Population density in 2010 was 993 persons per square mile, three times the national average. Between 1935 and 1994, the population grew rapidly. Growth, however, declined sharply after 1994. While declining fertility contributes to the slow-down, out-migration is a far more important factor. With visa-free entry under COFA to live and work in the United States, many Chuukese are opting to escape an increasingly difficult economy at home by immigrating to Guam, Hawaii, and the U.S. Mainland.

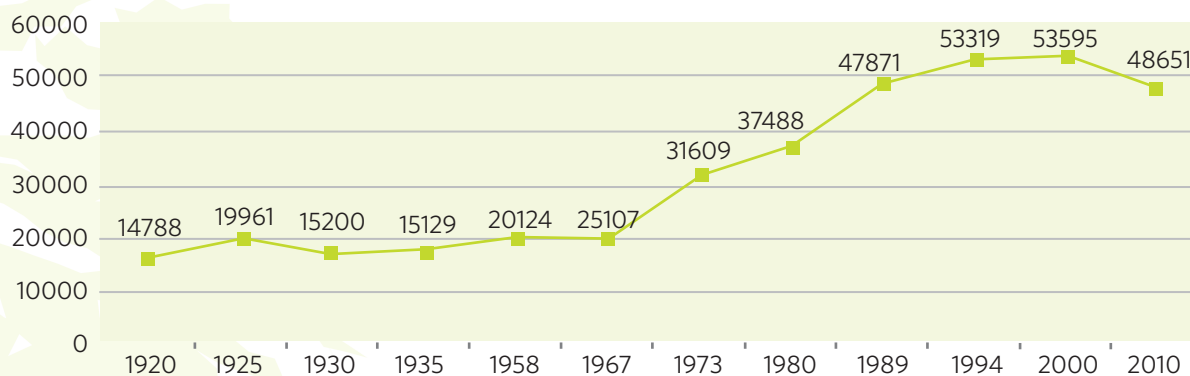
Chuuk has a constitutional government comprised of three co-equal branches. The Governor and Lieutenant Governor head the Executive Branch and are responsible for executing laws and delivering state services. Law making functions are vested in a two-house legislature comprised of a 10-member Senate and a 28-member House of Representatives. Judicial functions are vested in a state supreme court.

Chuuk faces many challenges in its quest to develop, provide its people with quality of life, and achieve the MDGs. Geography is a major challenge. Populations are widely scattered both within and outside of the lagoon. Transportation and communications are expensive, erratic and of generally poor quality; there are few regularly scheduled ships travelling to the outer islands and virtually no regularly scheduled vessels traveling within the lagoon. This means that health and education personnel on the various islands are often "on their own" to provide what services they can with whatever supplies reach them.

High population densities are another challenge. As the monetary economy has declined, more people now struggle to earn a subsistence living from a limited resource base that in many areas has been depleted by pollution and unsustainable methods of harvest. The challenges are further exacerbated by what is widely acknowledged as a generally poor standard of governance. While there can be no doubt that there is increasing hardship in Chuuk, the resilience of the natural resource base to support a subsistence lifestyle combined with remittances from those who have migrated provide lifelines that manage to keep abject poverty at bay for now.

Chuuk Population 1920-2010

Source: 2000 Census, Volume II & Provisional Census 2010



MDG 1 – Poverty and Hardship

One in four households in Chuuk lives below the basic needs poverty line while one in 10 households live below the food poverty line. Other poverty indicators – depth and severity of poverty, and inter-household inequality – are close to national averages.

Labor force participation rates are similar to the national average (Chuuk 57%; national 59%) but only a quarter of the labor force is active in the wage- salary sector and a third of the labor force is unemployed (SBOC, 2007). Between 1995 and 2009, the state lost 33% of its wage-salary jobs (McKinley, et al., 2010). Subsistence is the main lifeline keeping households, especially low income households, afloat; 73% of the income of the lowest earning households is non-cash (subsistence and imputed rent of owner-occupied housing). Even high income households depend to a significant extent on non-cash earnings; 19% of income of the highest earning households is non-cash. Remittances are another important source of income for households across all income levels (Abbott, 2008).

MDG 2 – Education

Although school participation and youth literacy rates are only slightly lower than the national average, primary school survival rates are much lower than the national average. For the cohort of students entering grade one in 1997-98, only 60% of males and 72% of females reached grade eight. Much of this attrition is undoubtedly due to migration as the official drop-out rate is less than 2% for all 12 years of schooling. Female school participation rates are significantly higher than those of males at all levels of schooling (preprimary, elementary, and secondary). Female participation in secondary school is not only far higher than for males (84% female versus 71% male) but significantly higher than the national average (Chuukese females 84%; national average 75%).

What the MDG indicators do not show, however, is that except for a few exceptional schools such as the Catholic Xavier High School, Chuukese schools generally do not impart a high quality of education. The U.S. General Accounting Office (2007) and the Asian Development Bank (2009) have highlighted the crisis in Chuukese education as have many other reports by domestic and international evaluators. Key issues include: poorly qualified teachers (47% have only a high school education); high levels of absenteeism by both teachers and students; frequent class cancellations due to a plethora of reasons; poor physical facilities including basic infrastructure – transportation, communications, power, water, and toilets. Interventions are in progress but ADB cautions that there is no “quick fix” to problems that have proliferated over many years and suggests that at least a decade is a reasonable timeframe for turning the Chuuk education system around (ADB, 2010).

MDG 3 – Gender

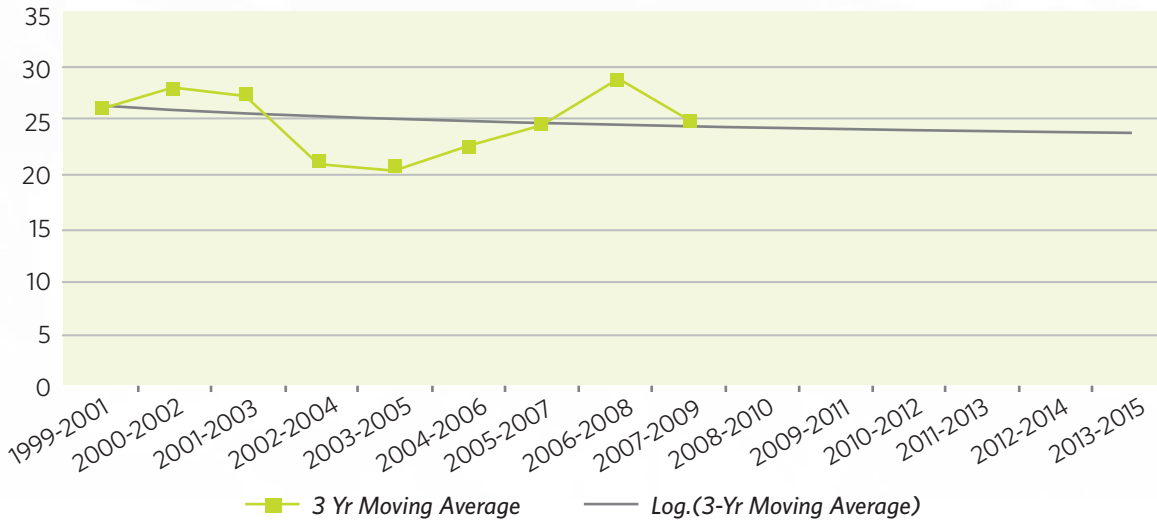
As noted, girls outpace boys at every level of education in Chuuk from pre-primary through to college level. To-date, however, this has not translated into higher levels of wage employment for women (ratio of women to men in the wage and salary sector Chuuk 0.39; national 0.49). Statistics underscore reports by women themselves that even well-qualified female graduates face many obstacles in finding employment commensurate with their skills despite constitutional and legal provisions that prevent discrimination on the basis of gender. It is worth noting that Chuuk State Legislature is only two of the five legislative bodies in the FSM that has had a female office-holder but this milestone does not yet signal widespread change in deeply entrenched ideas about women’s place in community and political life.

MDG 4 – Child Mortality

Health services in Chuuk face some of the same challenges faced by the schools namely poor facilities, lack of basic support infrastructure – communications and transportation; and lack of predictable supplies delivered to rural outposts. Chuuk’s infant mortality rate has exceeded the national average for 9 of the past 11 years. Although rates fluctuate widely from year-to-year, the trendline is essentially flat suggesting no significant improvement in mortality rates over the last decade. The death rate for children 1-14 years of age is nearly double the national average (Chuuk 65/100,000; national 35/100,000, 2009 statistics) suggesting high levels of infectious diseases and weak primary health care.

The fact that Chuuk’s immunization coverage rate for two-year old children is just slightly below that of the nation as a whole (Chuuk, 66%; national 68%) might suggest a relatively strong primary health care system. Statistics, however, belie the fact that

Chuuk Infant Mortality Rate
Deaths per 1,000 Live Births



Chuuk Infant Mortality Rate Ages 1-14
Deaths per 100,000



achieving even mediocre coverage (and 67% completed immunizations must be termed mediocre) requires extraordinary efforts to mobilize people, transport, and supplies. Coverage is not the result of a well-functioning primary health care system but instead crises intervention, generally led by national government, in response to outbreaks or the threat of outbreaks in this most densely populated state.

The one health statistic on which Chuuk leads the nation is breastfeeding. 90% of Chuukese infants continue to receive breastmilk at six months of age (compared to a national average of only 73%).

MDG 5 - Maternal Health

Over the 11-year period (1999-2009), Chuuk reported 11 maternal deaths all concentrated in the period 2004-2006. This gives Chuuk an average MMR of 98 (deaths per 100,000 births) which is the lowest rate of all the FSM states. This is actually surprising given the significant geographic and cultural constraints faced by women outside of Weno in accessing reproductive health and obstetric services. Though encouraging, the possibility of under-reporting of deaths cannot be discounted.

Reported fertility is also lower in Chuuk than the national average across all age levels (Chuuk total fertility, 2.1; national 2.7, 2006 data); adolescent fertility is nearly half the national average. Chuuk's score on the Kotelchuk Index is only a little below the national average (Chuuk, 57%; national 60%) and 87% of deliveries are attended by trained health personnel. Taken together, these statistics indicate that Chuuk is making good progress toward MDG 5.

MDG 6 - Other Diseases

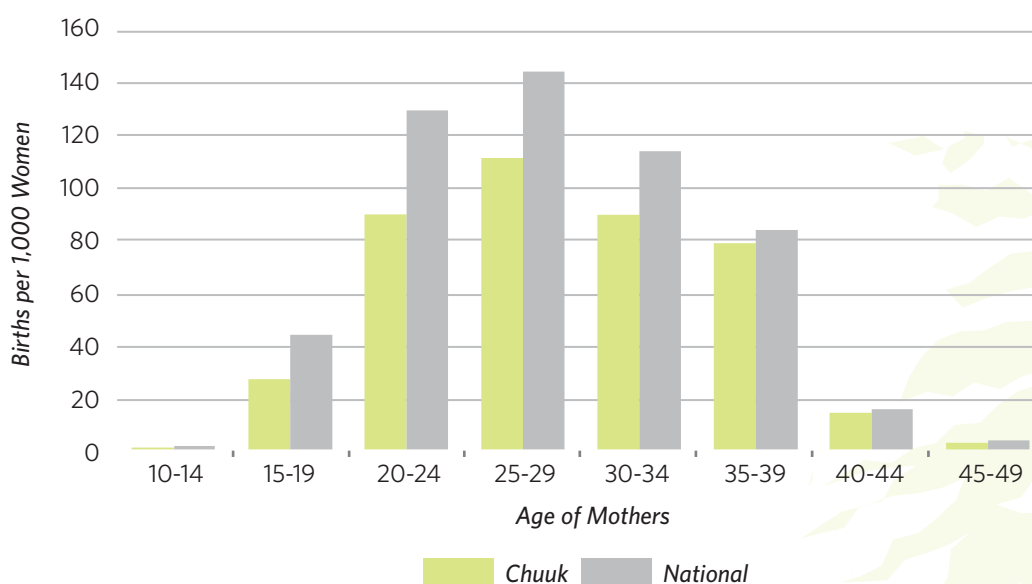
With 50% of the population, Chuuk has contributed 62% of the cumulative HIV- AIDS caseload. In a Second Generation survey in one island group, 30% of respondents indicated they had used a condom during their most recent high risk sexual contact while 23% of men and 24% of women had good knowledge of HIV prevention and transmission modes. These indicators are higher than some of the other FSM populations surveyed but suggest a need to expand and intensify education efforts in Chuuk.

Over the period 2006-2008, Chuuk has accounted for 54% of newly diagnosed cases of tuberculosis. While Chuuk's tuberculosis incidence rate is just slightly above the national average (Chuuk 197/100,000; national 146/100,000), Chuuk's prevalence rate is almost 40% above the average (Chuuk 231/100,000; national 168/100,000) and the tuberculosis death rate is substantially above average. Although Chuuk reports 100% DOTS coverage, in reality it is very challenging to strictly adhere to DOTS given Chuuk's geography and weak infrastructure. Incomplete DOTS coverage contributes to a serious problem of Multi-Drug Resistance (MDR) disease (FSM DHSA, personal communications).

Non-communicable diseases (NCDs) are a major source of morbidity and mortality in Chuuk but the statistics needed to guide program development and implementation are not yet available. A Step-wise survey was conducted with the assistance of WHO in 2006 but unfortunately, there has been delay in receiving the analyzed results back from WHO. Four years post-survey, health officials are still working largely "in the dark" as they grapple with NCDs amidst continuing high levels of communicable diseases and formidable challenges in managing the primary health care system.

Age Specific Fertility Rate, Chuuk & FSM

Source: FSM Statistical Yearbook 2008



MDG 7 - Environmental Sustainability

The combination of small land area and high population densities mean that Chuuk has very limited terrestrial resources. Although the most recent forest inventory shows 83% of land area to be forested, there is very little primary forest remaining. Most primary forest has been converted to palm plantations or agro-forestry. Consequently, many of the endemic plant and animal species resident on Chuuk are considered to be threatened or endangered (Falanruw, 2002).

Water resources are particularly limited due to low average rainfall (in contrast to neighboring Kosrae and Pohnpei), deforestation, and high populations. During drought conditions 69% of available surface water is typically used in Weno, the only island for which there is data relevant to the water supply indicator. Virtually all of the outer islands are atolls. Water comes from roof catchments or wells dug into the shallow fresh water lens that floats on the seawater beneath the islands. Drought in the outer islands can be devastating to human health and the environment.

Most available information about the status of marine resources comes from Weno and the lagoon islands; much less is known about the resource base of the outer islands. With a reef monitoring system in infancy, quantitative data about the health of Chuuk's marine ecosystem and resources are lacking. A series of interviews with local fishers held in 2006, however, found a general consensus that inshore fishery resources had been depleted especially over the past decade. Evidence cited included: fewer fish being caught per hour of effort; fish sold in markets are smaller; once common species being caught infrequently and seldom found in markets. Especially in the Chuuk Lagoon the use of dynamite for fishing is a particularly pervasive and destructive problem (Kostka & Gavitt, 2006).

Besides better laws and better law enforcement, the intervention of choice to reverse marine resource depletion is community designation of marine protected areas that protect species of particular importance to the community owning the resource. As of mid-2010, 2% of the inshore marine area around the main island was protected. Seventeen percent (17%) of terrestrial areas in the main island group are also protected (FSM R&D, 2010).⁷¹

Chuuk has the lowest access to improved water and sanitation systems in the FSM (water, 31%; sanitation 13%). The only public water system serves Weno; this system does not systematically treat the water distributed. Likewise the only public sanitation system is on Weno but this system dumps raw sewage directly into the lagoon, a practice that contributes to in-shore water pollution, marine resource depletion, and high rates of gastroenteric diseases.

MDG 8 - Partnerships

Like the other FSM state governments, Chuuk State Government is heavily dependent on ODA (inclusive of COFA funding). On average, 80% of state government revenues are derived from ODA. Chuuk has the lowest market penetration by modern communication technologies among all the states. Lack of electric power in many outlying communities and unreliable power in Weno provide few incentives for individuals or businesses to invest in communications technologies.

Conclusions

Chuuk is doing reasonably well vis-à-vis the MDGs but the MDG indicators do not tell the complete story. Remittances and subsistence production keep many households afloat economically; without these resources, poverty indicators would be much worse than they are today. It is generally agreed, however, that subsistence resources - especially marine resources in the Weno lagoon - are under stress. Poverty alleviation and prevention over the medium term will depend on Chuuk's ability to implement MDG 7 (environmental sustainability) and its ability to get on track with long-term sustainable economic growth.

While performance vis-à-vis the MDG education indicators is good, the indicators do not measure quality of education which is particularly problematic in Chuuk. They also do not address "brain drain" as many of Chuuk's educated elite choose to live and work outside of Chuuk - in the national government in Pohnpei, Guam, or the United States. Likewise, health indicators mask the many challenges in delivering health care in a widely dispersed environment where basic infrastructure is either lacking or unreliable (e.g. power, communications, and transportation). Overall, Chuuk's capacity for achieving most of the MDGs by 2015 is extremely limited. Chuuk may wish to consider developing a shorter list of localized MDGs that are attainable and concentrating efforts towards these more realistic objectives. Papua New Guinea has taken this approach to several MDGs with reportedly positive results (UNDP 2010).

⁷¹ Note that information is not available on areas protected outside of the main island group.

Selected MDG Indicators for CHUUK STATE

MDG, Target, Indicator	Year	National	CHUUK	Source
MDG 1. Poverty, Hardship, Hunger				
Target 1.A. Reduce poverty levels				
Food poverty line	2005	\$5,027	\$4,801	2005 HIES; Abbott, 2008
Basic needs poverty line	2005	\$8,031	\$7,174	
Households below food poverty line	2005	7.8%	9.6%	
Households below basic needs poverty line	2005	22.4%	23.1%	
Persons below food poverty line	2005	11.0%	12.2%	
Persons below basic needs poverty line	2005	29.9%	28.7%	
Poverty gap ratio (depth of poverty)	2005	9.3	8.5	
Squared poverty gap ratio (severity of poverty)	2005	4.0	3.6	
Expenditure share of poorest quintile of households (20%) of households	2005	8.5%	8.4%	
Ratio of expenditures in the lowest expenditure quintile (20%) of households to the highest expenditure quintile of households (Q1:Q5)	2005	4.2	4.2	
Gini coefficient (income equality)	2005	0.27	0.27	
Target 1.B. Employment				
GDP per person employed (formal sector)	FY 95 FY09	\$13,069	\$12,473	McKinley, et al.,2010
GDP per person employed (annual growth)		\$13,939	\$15,904	
		0.4%	1.8%	
Population employed (formal sector)	2009	14.4%	7.7%	
Persons 15+ years of age in labor force (%) - Total/Male/Female	2000	59/67/50%	57/67/48%	Census 2000
Labor force in formal sector jobs (%) - Total/Male/Female	2000	37/44/39%	25/31/17%	
Labor force unemployed (%) - Total/Male/Female	2000	22/21/24%	34/31/39%	
Working poor (households in lowest 30% expenditure with one or more workers)	2005	77.9%	71.8%	HIES 2005
Target 1.C. Hunger				
Prevalence of underweight children under-five years of age	---	No data	No data	---
Proportion of population below minimum dietary energy consumption	---	No data	No data	---
MDG 2. Education				
Target 2.A. Universal primary education				
Gross enrollment - Preprimary (total/male/female) - Primary (total/male/female) - Secondary (total/male/female)	2000	68/63/74% 97/98/95% 79/83/75%	30/29/31% 93/92/94% 77/71/84%	Census 2000
Net enrollment - Preprimary - Primary - Secondary	2009	34% 96% 69%	35% 94% 67%	FSM Dept of Education (JEMCO)
Teachers with a college degree	SY 2007-8	62.5%	52.8%	
Literacy rate 15-24 year olds - 15-19 year olds	2000	95.4%	92.7%	Census

	Year	National	CHUUK	Source
MDG 3. Promote Gender Equality and Empower Women				
Target 3-A. Equality in education				
Ratio of girls to boys primary education	SY08-09	0.96	0.97	FSM Dept. of Education (JEMCO)
Ratio of girls to boys secondary educ.		1.02	1.09	
Ratio of girls to boys enrolled in COM		1.14	1.31	
Ratio women to men in wage employment	2000	0.49	0.39	Census
Ratio of women to men earnings	2000	0.87	NAv.	Census
Legislative seats held by women	2007	0.0	2.6%	FSM SBOC
Legislative compliance with CEDAW - Full/partial/non-compliant	2004	27/16/57%	26/19/55%	iknowpolitics.org
MDG 4. Reduce Child Mortality				
Target 4-A. Reduce infant and child mortality by two-thirds				
Infant mortality rates (infant deaths per 1,000 live births)	2009	13	18.6	FSM DHSA; civil registration
Under 5 mortality (deaths among children 0-59 months of age per 1,000 live births)	2009	NAv	NAv	FSM DHSA
Deaths among children 1-14 per 100,000 children ages 1-14	2009	35.9	65	FSM DHSA
Fully immunized (% children 2 years old)	2009	67.8%	65.6%	FSM DHSA
Infants (%) breastfeeding at 6 months	2009	73.4%	90%	FSM DHSA
MDG 5. Maternal Health				
Target 5-A. Reduce maternal mortality by three-quarters				
Maternal mortality ratio (maternal deaths per 100,000 live births)	1999-2009	161	98	FSM DHSA; Civil registration
Births (%) attended by skilled personnel	2008	90%	87.3%	Statistical Yearbook 2008
Target 5-B. Ensure universal access to reproductive health services				
Contraceptive prevalence rate (women 15-49 years of age using modern family planning methods)	2009	40%	NAv.	FSM DHSA
Adolescent birth rate (births to women 15-19 years of age per 1,000 women)	2006	42.5	24.9	FSM Statistical Yearbook 2008
Births (%) preceded by at least one antenatal visit	2004	92%	NAv	FSM DHSA
Births (%) preceded by at least 4 antenatal visits	---	NAv	NAv	
Births (%) preceded by antenatal care scoring 80% on the Kotelchuk Index	2009	60%	56.6%	FSM DHSA
Unmet need for family planning services (sexually active women not using contraception not wanting children at this time)	---	NAv	NAv.	---
MDG 6. HIV and AIDS, Malaria, Tuberculosis and Other Diseases				
Target 6-A. Halt and begin to reverse the spread of HIV-AIDs				
Cumulative prevalence rate	1989-2009	34.6	42.9	FSM DHSA
Condom use at last high risk sex (one island ages 15-44)	2007	---	30%	Second Generation Survey (1 island only)

	Year	National	CHUUK	Source
MDG 6. HIV and AIDS, Malaria, Tuberculosis and Other Diseases continued...				
Persons with good knowledge of prevention and transmission (ages 15-44)	2007	---	M=24% F=23%	2nd Generation Survey
Target 6-B. Halt and begin to reverse the incidence of tuberculosis				
Incidence rate per 100,000 population	2008	146	197	FSM DHSA
Prevalence rate per 100,000 population	2008	168	231	
Death rate per 100,000 population	2008	14.8	24.4	
DOTS coverage	2008	100%	100%	
Target 6.C. Halt and begin to reverse the spread of NCDs (cancer and diabetes mellitus)				
Chuuk survey completed in 2006; awaiting analyzed results from WHO	---	---	---	STEPS report pending
MDG 7. Environmental Sustainability				
Target 7-A. Integrate the principles of sustainable development into policies and programs; reverse the loss of environmental resources				
Land area covered by forests (%)	2006-7	89%	83%	US Forest Serv.
Water resource utilization (Weno only) - Normal conditions - Drought conditions		23% 37%	50% 69%	SPREP
Target 7-B. Reduce biodiversity loss and by 2010, achieve a significant reversal of loss				
Area in protection status - Marine/Terrestrial	2010	6/15%	2/17%	FSM R&D
Target 7-C. Halve the proportion of the population without sustainable access to improved water and sanitation				
Access to improved drinking water	2005	57%	31%	HIES
Access to improved sanitation	2000	25%	13%	Census
Households with toilet facilities	2005	73%	68%	HIES
Target 7-D. By 2020 to have achieved significant improvement in the lives of urban slum dwellers				
Households with security of tenure	2000	94%	92%	Census
MDG 8. Forge Global Partnerships for Development				
Target 8-A. Develop an open, rule-based, predictable, non-discriminatory trading and financial system				
Government revenue & grants % of GDP	FY 09	84%	45%	McKinley, et al., 2010
ODA as % of Government revenue	FY 09	68%	82%	
ODA as % of GDP	FY 09	57%	40%	
Target 8-B. Address the special needs of least developed countries				
Not applicable to the FSM	---	---	---	---
Target 8-C. Address the special need of small island developing states				
Indicators not measurable sub-nationally				---
Target 8-D. Deal comprehensively with the debt problems of developing countries				
Indicators not measurable sub-nationally				---
Target 8-E. With pharmaceutical companies, provide access to affordable essential drugs				
Data unavailable to measure as state.				---
Target 8-F. Make available the benefits of new technologies, especially information and communications				
Telephone lines per 1,000 population	2005	108.3	42.0	FSMTC
Cellular subscribers per 1,000 population	2007	213.1	112.5	FSM Statistical Yearbook 2008
Internet subscriptions per 1,000	2005	15.8	24.2	FSMTC



Section 3.3.

MDGs and KOSRAE STATE



Introduction

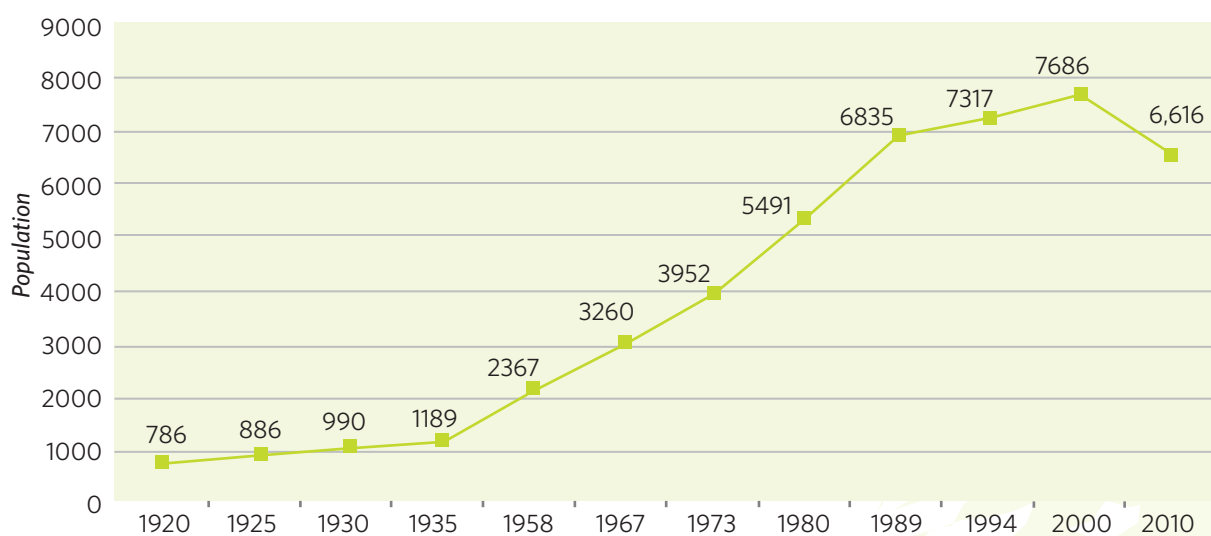
The State of Kosrae is located at 163° east longitude and 5° north latitude, the furthestmost state both south and east in the FSM. Kosrae is comprised of only one relatively large island (42.3 square miles). It is the only single-island state in the FSM and the only state without a significant lagoon. Because the interior of the island is steep and rugged, its five villages all lay along the coast. Four are connected by paved road, while one - Walung - is accessible only by boat. It takes approximately two hours to drive from one end of the island to the other.

The population of Kosrae in 2000 was 7,686 (census data) and in 2010, 6,616 (provisional census data), a drop of 15%. Population density (2010) was 156 persons per square mile, the lowest of the four states. The median age in 2000 was 19.2 years with 52% of the population under the age of 20. Kosraeans are all a single ethnic group and speak a common language. They are known for being conservative and deeply religious. Eighty-nine percent (89%) of people are members of the Congregational Church which plays a major role in community life.

Kosrae's geography means that delivery of basic services is relatively easy in contrast to Chuuk and Yap where populations are dispersed over a vast ocean area. The lack of a lagoon and the very rugged interior, however, mean that Kosraeans are more dependent on earnings from wage and salary employment than other Micronesians. In recent years, as elsewhere in the FSM, the wage and salary sector of the economy contracted. Between 1995 and 2008, 9% of formal sector jobs disappeared although there was sharp recovery in 2009 driven by the wholesale and retail trade sector (McKinley, et al., 2010). With more limited livelihood options than elsewhere, job loss has resulted in a dramatic increase in the number of households living below the basic needs poverty line (see MDG-1).

The Kosrae State Government is a constitutional democracy with three branches: Executive, Legislative and Judiciary. Under the Executive Branch, the Governor is the highest elected official and directs ten government departments and offices. The legislative power of the state is vested in the Kosrae legislature composed of 14 Senators elected from four electoral districts - Lelu, Malem,

Kosrae Population 1920-2010
Source: FSM Statistical Yearbook 2008



Tafunsak, and Utwe. Judicial power is vested in the Kosrae State Court headed by a Chief Justice appointed by the Governor and confirmed by the legislature. Decisions by the Kosrae State Court can be appealed to the Appellate Division of the FSM Supreme Court. All elected officials serve 4-year terms except for justices who serve six year terms.

MDG 1 - Poverty and Hardship

Although Kosrae has a smaller proportion of its people living below the food poverty line than the national average (Kosrae 8.8%; national 11%), it has a larger proportion below the basic needs poverty line (Kosrae 34%; national 29.9%). This suggests that poverty-hardship is more pervasive in Kosrae than elsewhere but less severe. As already noted, Kosrae experienced a dramatic increase in poverty between 1998 (12% below the basic needs poverty line) and 2005 (34% below the basic needs poverty line).⁷² This reflects a higher level of dependency on wage-salary employment (65% of the Kosrae labor force is in the wage-salary sector compared to 37% nationally). It also reflects a lower contribution of subsistence to household income (In Kosrae, subsistence production averages 8.5% of household income compared to a national average of 18%). Remittances in Kosrae also comprise a smaller share of household income than elsewhere.

A smaller proportion of the Kosrae population is in the labor force than nationally (Kosrae 48%; national 59%). Kosrae has the lowest proportion of women in the labor force (Kosrae 37%; national 50%). Gross Domestic Product (GDP) per person employed in the wage-salary sector is lower than the national average (Kosrae \$11,894; national \$14,892) reflecting the small size of most local businesses on Kosrae and underdeveloped export and tourism sectors.

MDG 2 - Education

In terms of education, Kosrae is doing very well. It has achieved virtual universal primary education (gross enrollment 99%, 2000; net enrollment 88%, 2009) and universal youth literacy (99.9% male; 99.5% female, 2000). Kosrae has the highest rate of secondary enrollment in the FSM (gross enrollment 83%; net enrollment 70%). Although school participation levels by girls are high, there is a marked gender differential in terms of primary school survival (112% of boys survive to grade ten versus 96% of girls, SY 1997-98 cohort). Kosrae is known locally as having good school facilities and a generally higher standard of instruction than in the larger states. Although published statistics do not provide student test scores according to state, a proxy indicator of educational quality is the proportion of teachers with a college degree (Kosrae 95.5%; national 62.5%).

Kosrae's favorable position in relation to education reflects in part its geography, which affords the entire population access to schools with minimal travel time and difficulty. It also reflects the strong influence of the Congregational Church which, since its founding in 1852, has emphasized basic education and literacy as a means of ensuring everyone can study the Bible.

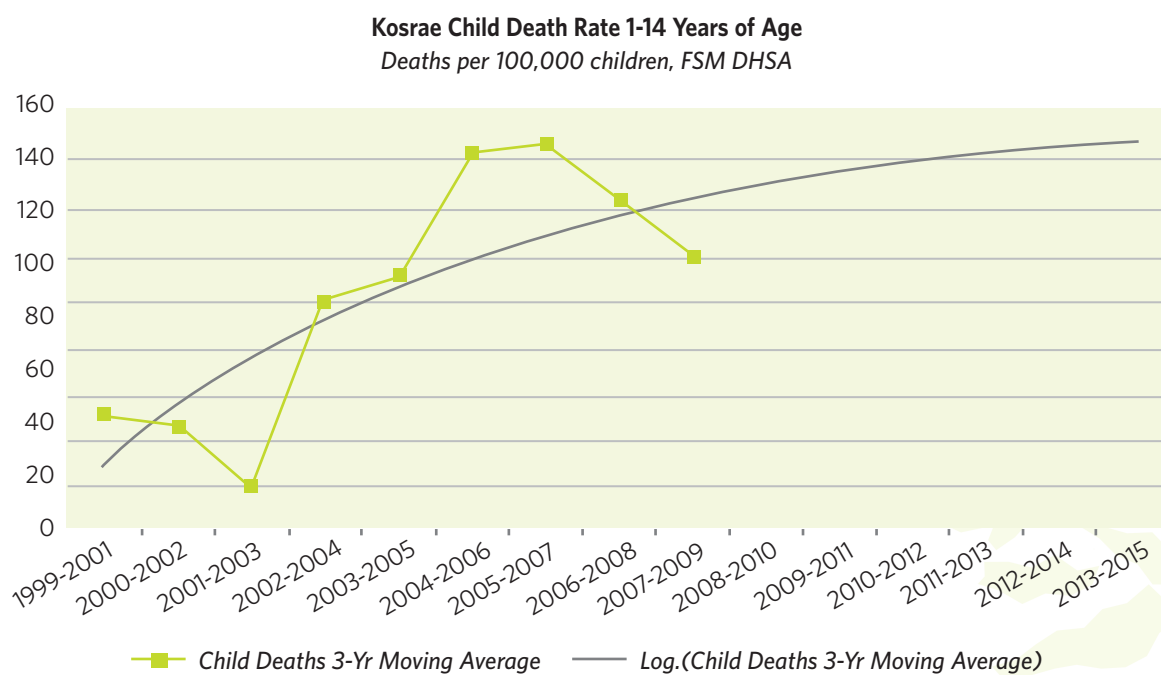
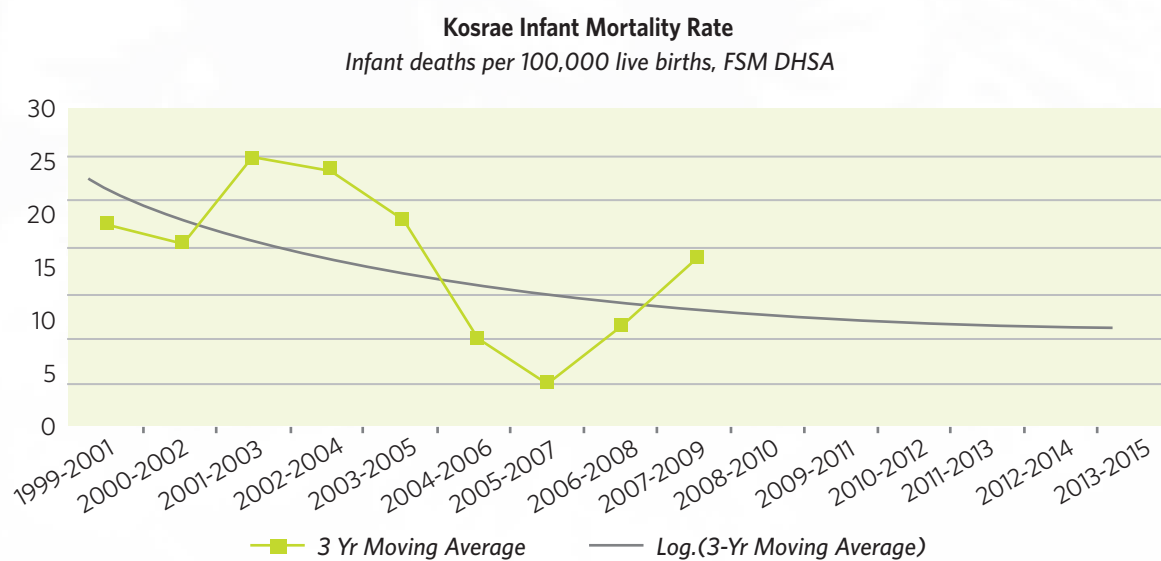
MDG 3 - Gender

Kosraean women have achieved equality with men in education and literacy. Women, however, are less likely to be in the labor force than men (men 60%; women 37%) and those in the labor force, are less likely than men to hold wage and salary employment (men 70%; women 57%). Like their sisters in most of the other FSM states, Kosraean women have not yet achieved significant inroads into political life, a reflection of both tradition and the influence of the conservative church.

MDG 4 - Infant and Child Mortality

Because of the very small population, there is wide inter-year variation in infant mortality although as the figure on the page following shows, there is a generally strong downward trend with Kosrae projected to fully achieve the mortality target of MDG 4. On the other hand, for children ages 1-14, the trend line is reversed with a strong upward trend. Although any interpretation must be made with extreme caution due to the small numbers, these trends suggest that relatively greater attention needs to be given to protecting the health and well-being of children. As would be expected given Kosrae's geography, immunization levels are very high (97% completed at 2 years of age). Breastfeeding rates at 6 months of age, however, are slightly below the national average (Kosrae 65.7%; national 73.4%, 2009 data).

⁷² See Section 2.1. for discussion about the difficulties in directly comparing poverty rates between 1998 and 2005.



MDG 5 - Maternal Health

Since 1999, there have been a total of 8 maternal deaths reported in Kosrae (1 each in 2001, 2005, and 2007 and 5 in 2004). There have been no maternal deaths reported in recent years. Although virtually all births occur in the hospital (97%, 2006) and Kosrae has a high Kotelchuk score (Kosrae 80%; national 60%), Kosraean women have a strong preference for having their actual deliveries attended by traditional birth attendants (56% deliveries performed by non-medical personnel, 2006).

The total fertility rate for Kosrae is higher than the national average and second only to that of Pohnpei (Kosrae 3.4; national 2.7, 2006 data). As shown in the figure (page following), adolescent fertility is lower than the average (Kosrae 32.6; national 42).

MDG 6 - Specific Diseases

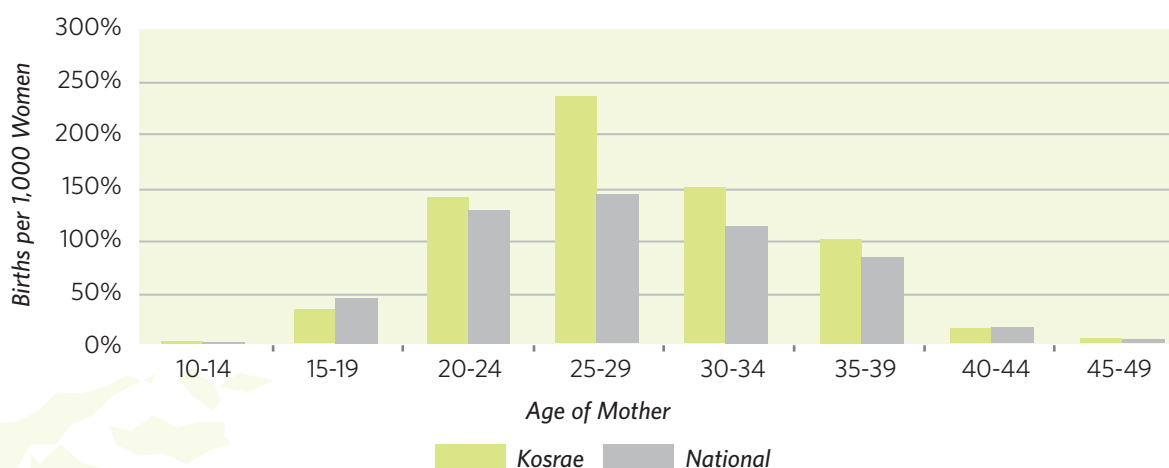
Kosrae has a slightly higher cumulative prevalence of HIV-AIDs than the national average (Kosrae 52; national 34). No youth or second generation surveys have been carried out to provide quantifiable information about risk behaviors, condom use, and knowledge of prevention and transmission, all global MDG indicators. Kosrae's incidence and prevalence of tuberculosis is lower than the national average (Kosrae prevalence 122/100,000; national 168/100,000) and there have been only one tuberculosis deaths reported recently (in 2007). Directly Observed Therapy (DOTs) coverage is 100%. This favorable situation is partially reflective of Kosrae's geography combined with a strong public health program.

Non-communicable diseases are known to be a serious problem in Kosrae, as elsewhere in the FSM, but data are not yet available to access prevalence of disease or risk factors. A Step-wise survey supported by WHO is now in progress; when completed, this will give a good snapshot of the extent of the NCD problem in Kosrae.

Age-Specific Fertility Rate - KOSRAE and FSM

Births per 1,000 Women

Source FSM Statistical Yearbook 2008



MDG 7 - Environmental Sustainability

Kosrae has abundant natural resources in the marine waters surrounding the island which is steep and heavily forested. Ninety-four percent (94%) of the land area is under forest cover, much of it relatively undisturbed primary forest. Kosrae has the largest intact primary forest in Micronesia, a legacy of rugged landscape, designation of much of the interior land as public land for many years, and low population density.⁷³ Surrounded largely by mangroves, pristine sandy beaches break through the trees to provide access to the narrow surrounding lagoon. The reef flats surrounding the island are considered to be among the most pristine remaining in the world. Kosrae's biodiversity is significant with over 100 plant species, 335 fish species (250 are food species) and 180 species of coral. A formal reef monitoring program is still in the early stages of development. There is a general consensus, however, among knowledgeable locals that reef fisheries have declined substantially over the last decade. Fewer fish are being taken per hour of effort, fish in local markets are generally smaller in size, and once common species are caught infrequently and rarely seen in markets (KBSAP, 2004).

While the main threat to marine biodiversity is overharvest, other threats include: destructive harvest methods; pollution; habitat destruction (e.g. landfills, coral dredging, and boat anchorages), climate change, and introduction of alien species. Although a number of marine species receive some legal protection or regulation of take (e.g. sea turtles, trochus, sea cucumbers, *Pinctada margaritifera* (black-lip mother-of-pearl oyster), lobsters, mangrove crabs, giant clams, and the humphead parrot fish, there is a consensus that even if all laws were followed, resources would still be in decline due to overharvest. Expansion of protected areas is a lead strategy for redressing this problem (KBSAP, 2004; Kostka & Gavitt, 2006).

On land, overharvesting of mangrove wood for fuel and pollution (e.g. illegal dumpsites and poorly designed pigpens), burning of vegetation, and habitat modification caused by development are the most serious environmental threats (KBSAP, 2004).

The Kosrae Island Resource Management Authority (KIRMA), working with community-based resource management committees, has prepared a State Land Use Plan. Special Conservation Areas designated in the plan identify the different ecosystem types to be managed and conserved. As of mid-2010, however, only 3% of marine areas and 12% of terrestrial areas had received formal protective status.

In terms of water and sanitation, 90% of homes have access to improved drinking water sources (public or community systems); 70% have access to improved sanitation (sewer or septic tanks); and 100% have toilet facilities. Management of animal wastes and solid wastes, however, are ongoing issues of concern; both affect the marine ecosystems and the productivity of Kosrae's small inshore marine area.

MDG 8 - Partnerships for Development

Like the other states in the FSM, government is the main contributor to the economy (contributing 75% of state GDP) and ODA is an important source of government revenue (Kosrae 70%; national 68%, FY 2009 date by McKinley). Kosrae is the most "wired" state in the FSM having more telephone lines and internet subscribers per 1,000 population than any other state.

Conclusions. Kosrae has virtually achieved most of the social targets (e.g. mortality reduction, school participation, gender equality in education). The remaining social targets (disease control, primary health care, and quality of education) are easily within reach by or before 2015. More work is needed to achieve the environmental targets but the prognosis for 2015 is favorable. Not so favorable are the economic targets - poverty, employment, and macro-economic stability. Kosrae has regressed in recent years against these targets; the five years remaining before 2015 is unlikely to provide adequate time to recoup from losses over the past decade. Achieving gender equality outside of schools - in the workforce and politics - is also likely to be challenging.

⁷³ Under the Japanese administration, land above the "Japanese line" was considered to be public land. Recent legislation has allowed original land owners to reclaim these lands, most of which is unsuitable for development due to excessive slope. Restoration of private ownership rights to Kosrae's rugged interior creates new challenges for ensuring sustainable development and protecting water and biodiversity resources.

Selected MDG Indicators for KOSRAE STATE				
MDG, Target, Indicator	Year	National	KOSRAE	Source
MDG 1. Poverty, Hardship, Hunger				
Target 1.A. Reduce poverty levels				
Food poverty line	2005	\$5,027	\$4,908	HIES 2005 Abbott, 2008
Basic needs poverty line	2005	\$8,031	\$8,204	
Households below food poverty line	2005	7.8%	7.1%	
Households below basic needs poverty line	2005	22.4%	27.1%	
Persons below food poverty line	2005	11.0%	8.8%	
Persons below basic needs poverty line	2005	29.9%	34.5%	
Poverty gap ratio (depth of poverty)	2005	9.3	9.4	
Squared poverty gap ratio (severity of poverty)	2005	4.0	3.7	
Expenditure share of poorest quintile of households (20%) of households	2005	8.5%	9.6%	
Ratio of expenditures in the lowest expenditure quintile (20%) of households to the highest expenditure quintile of households (Q1:Q5)	2005	4.2	3.6	
Gini coefficient (income equality)	2005	0.27	0.25	
Target 1.B. Employment				
GDP per person employed (formal sector)	FY 95 FY 09	\$13,069 \$13,939	\$11,219 \$10,567	Mckinley, et al., 2010
GDP per person employed (growth rate)		0.4%	-0.4%	
Population employed (formal sector)	2009	14.4%	17.3%	
Persons 15+ in labor force (%) - Total/Male/Female	2000	59/67/50%	48/60/37%	Census
Labor force in formal sector jobs (%) - Total/Male/Female	2000	37/44/39%	65/70/57%	
Labor force unemployed (%) - Total/Male/Female	2000	22/21/24%	17/14/21%	
Working poor (households in lowest 30% expenditure with one or more worker)	2005	77.9%	80.4%	HIES
Target 1.C. Hunger				
Prevalence of underweight children under-five years of age	---	No data	No data	---
Proportion of population below minimum dietary energy consumption	---	No data	No data	---
MDG 2. Education				
Target 2.A. Universal primary education				
Gross enrollment - Preprimary (total/male/female) - Primary (total/male/female) - Secondary (total/male/female)	2000	68/63/74% 97/98/95% 79/83/75%	39/38/41% 99/99/99% 83/83/83%	Census
Net enrollment - Preprimary - Primary - Secondary	2009	34% 96% 69%	16% 88% 70%	FSM Dept of Education (JEMCO)
Literacy rate 15-24 year olds - 15-19 year olds - 20-24 year olds	2000	95.4% 94.7%	99.9% 99.5%	Census

	Year	National	KOSRAE	Source
Primary & secondary teachers with a college degree	2007-2008	62.5%	95.5%	FSM DOE (JEMCO)
MDG 3. Promote Gender Equality and Empower Women				
Target 3-A. Equality in education				
Ratio of girls to boys primary education	SY08-09	0.96	1.00	FSM Dept. of Education (JEMCO)
Ratio of girls to boys secondary educ.		1.02	0.99	
Ratio of girls to boys enrolled in COM		1.14	0.64	
Ratio women to men in wage employment	2000	0.49	0.52	Census
Ratio of women to men earnings	2000	0.87	No data	Census
Legislative seats held by women	2007	0.0	0.0	FSM SBOC
Legislative compliance with CEDAW - Full/partial/out-of-compliance	2004	27/16/57%	29/16/55%	iknowpolitics.org
MDG 4. Reduce Child Mortality				
Target 4-A. Reduce infant and child mortality by two-thirds				
Infant mortality rates (infant deaths per 1,000 live births)	2009	13	22.9	FSM DHSA; civil registration
Under 5 mortality (deaths among children 0-59 months of age per 1,000 live births)	2009	NAv	NAv	FSM DHSA
Deaths among children 1-14/100,000 children ages 1-14	2009	35.9	74.3	FSM DHSA
Fully immunized (% children 2 years old)	2009	67.8%	97.0%	FSM DHSA
Infants (%) breastfeeding at 6 months	2009	73.4%	65.7%	FSM DHSA
MDG 5. Maternal Health				
Target 5-A. Reduce maternal mortality by three-quarters				
Maternal mortality ratio (maternal deaths per 100,000 live births)	1999-2009	161	384	FSM DHSA; Civil registration
Births (%) attended by skilled personnel	2008	90%	56%	Statistical Yearbook 2008
Target 5-B. Ensure universal access to reproductive health services				
Contraceptive prevalence rate (women 15-49 years of age using modern family planning methods)	2009	40%	NAv	FSM DHSA
Adolescent birth rate (births to women 15-19 years of age per 1,000 women)	2006	42.5	32.6	FSM Statistical Yearbook 2008
Births (%) preceded by at least one antenatal visit	2004	92%	NAv	FSM DHSA
Births (%) preceded by at least 4 antenatal visits	---	NAv	NAv	
Births (%) preceded by antenatal care scoring 80% on the Kotelchuk Index	2009	60%	79.5%	FSM DHSA
Unmet need for family planning services (sexually active women not using contraception & not wanting children now)	---	NAv	NAv	---

	Year	National	KOSRAE	Source
MDG 6. HIV and AIDS, Malaria, Tuberculosis and Other Diseases continued....				
Target 6-A. Halt and begin to reverse the spread of HIV-AIDs				
Cumulative prevalence rate	1989-2009	34.6	52.0	Second Generation Surveys
Condom use at last high risk sex (one island ages 15-44)	2007	No nat'l data	No data	
Youth with good knowledge of prevention and transmission	2007	No nat'l data	No data	
Target 6-B. Halt and being to reverse the incidence of tuberculosis				
Incidence rate per 100,000 population	2008	146	110	FSM DHSA
Prevalence rate per 100,000 population	2008	168	122	
Death rate per 100,000 population	2008	14.8	0.0	
DOTS coverage	2008	100%	100%	
Target 6.C. Halt and begin to reverse the spread of NCDs (cancer and diabetes mellitus)				
Kosrae survey in-progress	---	No nat'l data	Data not yet available	STEPS report pending
MDG 7. Environmental Sustainability				
Target 7-A. Integrate the principles of sustainable development into policies and programs; reverse the loss of environmental resources				
Land area covered by forests (%)	2006-7	89%	94%	US Forest Serv.
Water resource utilization				SPREP
- Normal conditions		23%	13%	
- Drought conditions		37%	33%	
Target 7-B. Reduce biodiversity loss and by 2010, achieve a significant reversal of loss				
Area in protection status - Marine/Terrestrial	2010	6/15%	3/12%	FSM R&D
Target 7-C. Halve the proportion of the population without sustainable access to improved water and sanitation				
Access to improved drinking water	2005	57%	90%	HIES
Access to improved sanitation	2000	25%	72%	Census
Households with toilet facilities	2005	73%	100%	HIES
Target 7-D. By 2020 to have achieved significant improvement in the lives of urban slum dwellers				
Households with security of tenure	2000	94%	93%	Census
MDG 8. Forge Global Partnerships for Development				
Target 8-A. Develop an open, rule-based, predictable, non-discriminatory trading and financial system				
Government revenue & grants % of GDP	FY 09	84%	75%	McKinley, et al., 2010
ODA as % of Government revenue	FY 09	68%	78%	
ODA as % of GDP	FY 09	57%	59%	
Target 8-B. Address the special needs of least developed countries				
Not applicable to the FSM				---
Target 8-C. Address the special need of small island developing states				
Indicators not measurable sub-nationally				---

Target 8-D. Deal comprehensively with the debt problems of developing countries				
Target 8-E. With pharmaceutical companies, provide access to affordable essential drugs				
Indicators not measurable sub-nationally				---
Target 8-F. Make available the benefits of new technologies, especially information and communications				
Telephone lines per 1,000 population	2005	108.3	198	FSMTC
Internet subscriptions per 1,000	2005	15.8	28.8	
Cellular subscribers per 1,000 population	2007	213.1	231	FSM Statistical Yearbook 2008



Section 3.4.

MDGS and POHNPEI STATE



Introduction

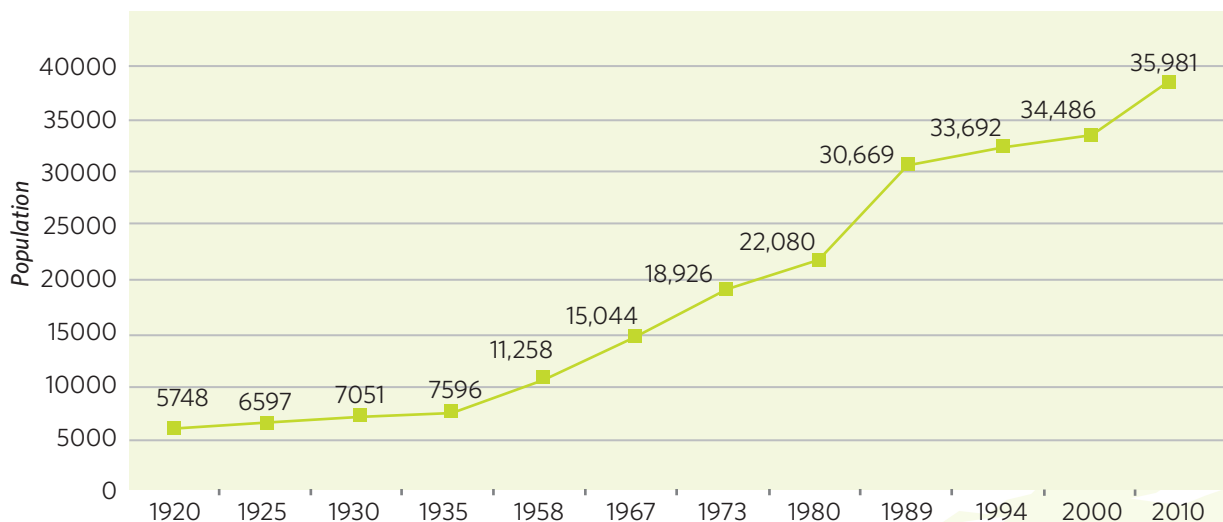
Pohnpei, the capital of the FSM, is located at 159-163° east longitude and 2-8° north latitude. It is comprised of one main high island surrounded by 25 islets ringing the barrier reef, five major distant atolls (Mwoakilloa, Pingelap, Sapwafik, Nukuroro, and Kapingamaranga), and three minor atolls (Oroluk, Pakin and Ant). The islands are spread over 100,000 square kilometers of ocean with a total land area of 211.2 square kilometers (the main island comprising 63% of the total). Pohnpei Island is rugged and mountainous and receives one of the highest rainfalls in the world ranging from 180 inches per year along the coast to 300 inches per year in the interior. Its steep terrain, heavy rainfall, and lush vegetation have earned it the motif "Garden Island of Micronesia."

The population in 2000 was 34,486 (census data) and in 2010, 35,981 (provisional census data), an increase of 4%. Like all the FSM states, population growth peaked in the 1980's and slowed thereafter, a combination of declining fertility and out-migration especially in the years immediately following independence with its option of visa-free entry into the United States under COFA.

The population density in 2010 was 261 (national average 395). The median age in 2000 was 18.9 years (identical to the national average) and 53% of the population was under 20 years of age.

Pohnpeian and English are the official languages of the state. Pohnpeian is the language of the home while English is the primary means of communication among the citizens of the different states in the FSM and the language of government and business. While Pohnpei State vernacular languages are part of the general Proto-Austronesian language structures they are spoken nowhere else in the world. In addition to Pohnpeian other vernacular languages include: Pinglapese, Mwoakilese (Mokilese) Sapwafikese (Ngatikese), Nukuoroan, Kapingamarangese (DOE, 2007). Due to its status as the site of the National Government Offices, all of the FSM languages may be heard in Pohnpei: Yapese, Ulithian, Woleian, Satawalese, Chuukese, Mortlockese, and Kosraean.

Pohnpei Population 1920-2010
Source: FSM Statistical Yearbook 2008



The State Government of Pohnpei is structurally similar to that of the FSM National Government with three separate branches: executive, legislative, and judicial. The Governor heads the Executive Branch with 8 cabinet members heading the main government departments. The members of the State Legislature are elected from the 11 municipalities (Madolenihmw, U, Kitti, Sokehs, Nett, Mwoakilloa, Pingelap, Sapwafik, Nukuoro, Kapingamarangi, and Kolonia Town).

MDG 1 - Poverty and Hardship

The poverty profile in Pohnpei is similar to that of the nation as a whole. Poverty increased only marginally between 1998 and 2005. In 2005, 6.8% of households lived below the food poverty line (national average 7.8%). Twenty-four point four percent (24.4%) of households lived below the basic needs poverty line (national average 22.4%). The poverty gap ratio and squared poverty gap ratio were slightly below the national average indicating that poverty is somewhat more severe in Pohnpei than elsewhere in the FSM.

- Poverty gap ratio
 - Pohnpei, 10.8
 - National, 9.3
- Squared poverty gap ratio
 - Pohnpei, 5.1
 - National 4.0

Surprisingly, despite the presence of the national government on Pohnpei, with its large population of relatively highly paid civil servants, measures of income inequity are virtually identical to national averages. These indicators suggest that inequality narrowed between 1998 and 2005.

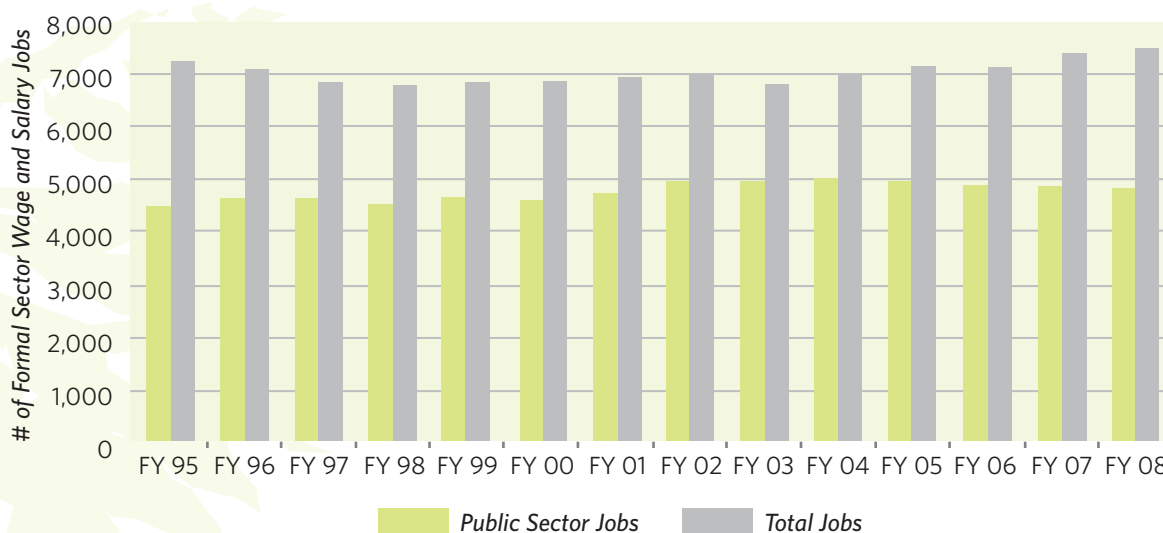
The one poverty-hardship indicator on which Pohnpei differs notably from the other states is working poor. 88% of households living below the basic needs poverty line have one or more members employed (national average 78%). Clearly in Pohnpei having a job does not in itself prevent poverty especially when pay is low relative to the cost of living.

Fifty-eight percent (58%) of persons over the age of 15 were in the labor force (national average 59%, census 2000). There was a significant gender bias (women 48%; men 60%) although this differential was similar to the gender bias evident for the FSM as a whole (women 50%; men 67%). 42% of persons in the labor force held wage and salary jobs (national average 37%) and 13% of both men and women were unemployed (2000 Census).

Despite some mid-cycle volatility, Pohnpei is the only state in the FSM that has seen net growth in wage-salary jobs over the period FY 95-FY 08 (see graph below). On average 67% of wage-salary jobs in Pohnpei are public sector (national, state, municipal, government entities, or foreign embassies).

Pohnpei Wage & Salary Jobs FY 95-FY 08

Source: McKinley, et al., 2010



Agriculture and fisheries (subsistence and semi-commercial) accounted for 45% of employment (2000 Census). Income from subsistence accounted for 8.4% of total household income and 20.6% of income for the lowest income category (2005 HIES). Remittances were another source of income contributing 2.5% of average household income but 4.2% of income in the lowest income households (2005 HIES).

In general, the situation with respect to poverty and hardship in Pohnpei appears to be stable. There is, however, little indication that Pohnpei will be able to achieve the MDG goal of halving poverty by the year 2015.

MDG 2 - Education

Pohnpei has achieved universal primary education (net enrollment 108%, 2009) and universal literacy among youth. The primary school survival rate is 82% to Grade 8 and 43% to Grade 10 with virtually no difference between girls and boys. Net secondary school enrollment is 67% (FSM DOE, 2009).

The national government does not publish student test scores disaggregated by state. A proxy measure used here for quality of education is the proportion of teachers with college degrees. In Pohnpei, 79% of teachers have degrees, a figure significantly higher than the national average (63%).

MDG 3 - Gender

Girls/women in Pohnpei have generally achieved equality with boys/men in education. The 2000 census found gross enrollment rates in favor of women across all levels of schooling. The latest net enrollment figures from the National Department of Education (SY 2008-2009) find virtual equality:

- Female:male ratio elementary, 0.96
- Female:male ratio, secondary, 1.02
- Female:male ratio, College of Micronesia, 1.12

As previously noted, equality in education has not yet translated into equality in the labor force.

- Female:male labor force participation, 0.73
- Female:male ratio, wage and salary jobs, 0.52
- Female:male ratio, non-formal sector, 0.97

These statistics tend to substantiate the claims by women themselves that it is very difficult for even well-educated women to break into the world of work despite legal and constitutional guarantees of equality.

Two Pohnpei women have succeeded in election to the State Legislature. It is hoped that this signals the beginning of a wider change in attitudes toward women in political leadership.

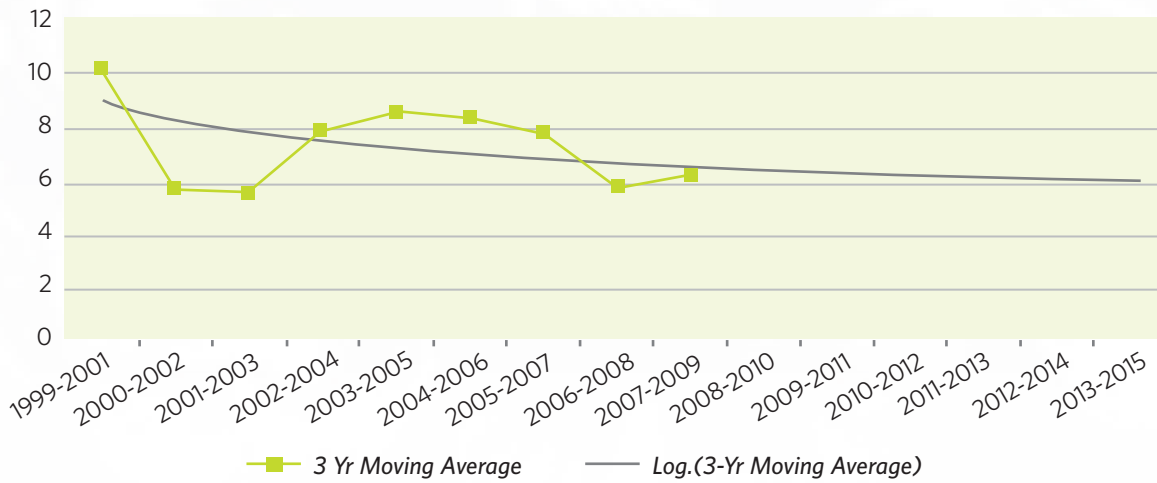
Pohnpei's laws are slightly more favorable to women than those in the other states. Based on an analysis shortly after FSM ratified CEDAW, 32% of Pohnpei laws are in full compliance with CEDAW (national average, 27%).

MDG 4 - Infant and Child Mortality

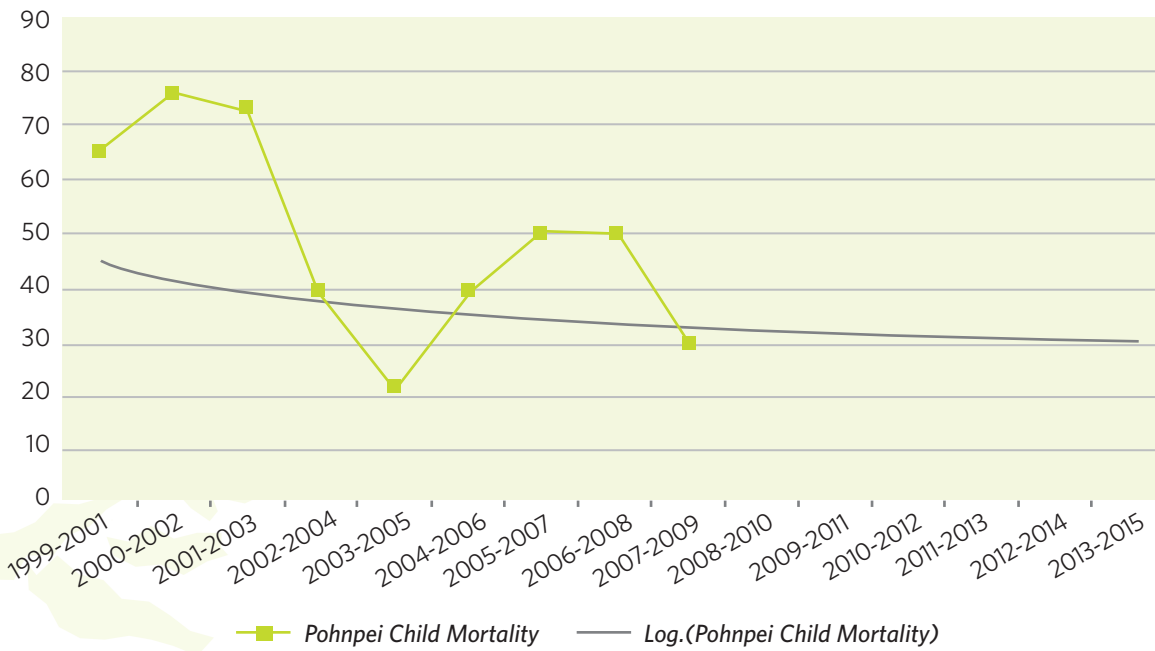
Infant and child mortality rates in Pohnpei are lower than the national average and exhibit clear downward trends consistent with a 75% reduction over a 25 year period in line with the MDG target (see figures on page following). Note should be made that Pohnpei's infant mortality rate is very low (4.0, 2009). Because this rate is at a level generally associated with only very highly developed countries and does not correspond with other related health indicators (e.g. antenatal coverage and immunization levels), under-reporting cannot be ruled out.

Immunization rates are relatively low (Pohnpei, 58%; national 67%, 2009). Breastfeeding rates at six months of age are also far below the national average (Pohnpei, 53%; national 73%). The relatively low continuation breastfeeding rates are disappointing given that Pohnpei Hospital is the only hospital in all of Micronesia that is officially certified by the World Health Organization as a Baby Friendly Institution. The explanation given by health authorities for the fall-off is that the vanguard of breastfeeding promotion in the past was a network of community-based support groups. These groups are not currently as active as they were formerly and this is being implicated in the decline in breastfeeding levels (FSM DHSA, personal communications).

Pohnpei Infant Mortality Rate
Deaths per 1,000 live births, FSM DHSA



Pohnpei Child Mortality Ages 1-14 Years
Deaths Per 100,000; Source FSM DHSA



MDG 5 - Maternal Health

Between 1999 and 2005, Pohnpei reported 11 maternal deaths but has not reported any deaths for the period 2006-2009. The 11-year cumulative MMR rate is 108 deaths per 100,000 births (national average 161). This is a moderate level of mortality but given small numbers, it is virtually impossible to discern trends. Eighty-seven percent (87%) of deliveries take place in a health facility; 96% are attended by trained personnel (2006 data, FSM Statistical Yearbook).

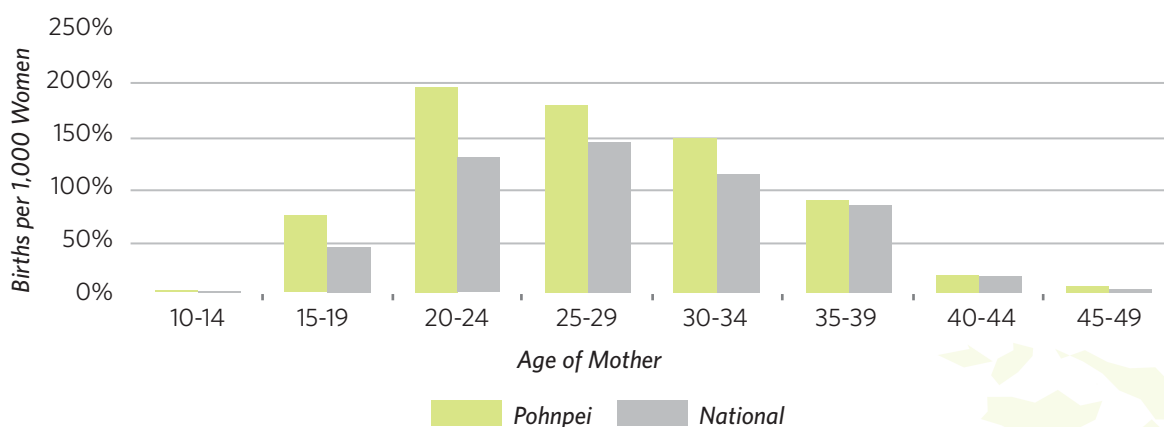
Other indicators of maternal health, however, are less positive. Pohnpei women have the highest total fertility rate in the FSM (Pohnpei, 3.6; national 2.7) with the differential evident across all age groups from teens to the latter reproductive years (see figure on page following). There are no data to indicate whether these higher fertility rates are by choice or reflect constraints on access to or use of contraceptives. Although 95% of women 15-44 years live on the Pohnpei Main Island with relatively easy access to health services, prenatal indicators are poor (Pohnpei Kotelchuk Index 49%; national 60%).

MDG 6 - Other Diseases

Pohnpei's cumulative prevalence rate for HIV-AIDS is lower than the national average (Pohnpei 23/100,000 population; national 35/100,000). In a second generation survey among youth, 35% indicated they had used a condom during their last high risk sexual encounter, a rate similar to other youth surveys but higher than found in most adult surveys. 26% of youth evidenced good knowledge of HIV prevention and modes of transmission; this was higher than among other youth populations surveyed (Second Generation Surveys, WHO-FSM DHSA).

Tuberculosis incidence and prevalence are lower than the national average (Pohnpei prevalence 117/100,000; national 168/100,000; 2008 data by FSM DHSA). Tuberculosis death rates are half the national average (8.6 deaths per 100,000; national 14.8).

Age Specific Fertility Rate - Pohnpei & FSM
Births Per 1,000 Women; Source Statistical Yearbook 2008



Pohnpei was the first Micronesian entity to undertake a Step-wise survey using methodology developed by the World Health Organization to assess risk factors for NCDs. The first survey was conducted in 2002; a follow-up survey is currently underway. The 2002 survey found high prevalence of both hypertension and diabetes. Twenty-one percent (21%) of adults 25-64 years had hypertension; 32% had diabetes. Prevalence of hypertension was higher among men than women (16% men; 27% women) but prevalence of diabetes was higher among women than among men (37% women; 26% men). Virtually the entire adult population had multiple risk factors for non-communicable diseases. 32% smoked; 64% were physically inactive; and 73% were overweight or obese (Pohnpei Health Department & WHO, 2002).

MDG 7 - Environment

The lush mountainous Pohnpei Island is Micronesia's largest landmass. Forests (mainly upland primary forest, agroforests, and mangroves) cover 93% of the state. Seven hundred and fifty different plant species (110 endemic) and 52 bird species (13 endemic) together with numerous species of reptiles, freshwater fish, and snails, call these forests "home." The high level of forest cover, however, belies rapid loss of primary (native) forest caused primarily by extension of agro-forestry, especially sakau (*kava*) plantations, into the interior. In 1975, it was estimated that native forests covered 15,000 hectares. By 1995, coverage had dropped to 5,000 hectares and by 2002, was down to 4,100 hectares (PBSAP, 2004). With NGOs (Conservation Society of Pohnpei and The Nature Conservancy) at the forefront of an aggressive and broad-based public awareness campaign, subsequent loss has slowed as community based organizations have taken action to protect the remaining strands of native forests.

Circling Pohnpei Island are mangrove forests that give way to mudflats and seagrass beds before sloping into the lagoon proper. Numerous patch reefs are found in the lagoon and a barrier reef some 144 kilometers long encircles the main island. Approximately 1000 species of fin fish and 200 coral species are found in the lagoon (Pohnpei State Government, 2004).

The leading threats to Pohnpei's biodiversity were identified in the Pohnpei Biodiversity Strategic Action Plan (2004) as being:

- Overharvesting;
- Destructive methods of harvest;
- Habitat conversion;
- Pollution;
- Invasive (alien) species introduction;
- Population growth, westernization, and commercialization of resources.

Pohnpei has a strong community-based environmental movement supported by NGOs and state government. A lead strategy for addressing the environmental problems confronting Pohnpei has been development of a state-wide network of protected areas. Today, Pohnpei has succeeded in placing under protective status 27% of its marine area and 19% of its terrestrial area. Pohnpei leads the FSM in expansion of protected areas as is rapidly approaching the 30%/20% target set by the Micronesian Challenge. Seventy-seven percent (77%) of households have access to improved drinking water (public or community water systems); 31% have access to improved sanitation (public sewer or private septic systems); 80% have toilet facilities.

MDG 8 - Partnership for Development

Pohnpei exhibits several positive economic trends that suggest movement toward greater fiscal sustainability with less dependence on ODA. Government revenues and grants comprise 31% of the state GDP (FY 2009. McKinley, et al., 2010), a fraction of the national average (84%, FY 2009. McKinley, et al., 2010). ODA represents 66% of total government revenues and 21% of GDP (FY 2009, McKinley, et al., 2010)

As would be expected in the national capital, Pohnpei enjoys good telecommunications, including the first fiber optic installation in Micronesia (opened in April 2010):

- Telephone lines per 1,000, 166
- Cellular subscribers per 1,000, 310
- Internet subscribers per 1,000, 25

Conclusions

If deaths reported by the civil registration system are accurate, Pohnpei has virtually achieved mortality reduction targets as well as school participation targets and protected area targets. Achieving other social targets - disease reduction, primary health care, and quality of education - is possible with more concerted effort. Pohnpei is in a better position than the other states vis-à-vis the economic targets but it is unlikely there is adequate time before 2015 to achieve poverty reduction, employment stimulation, and macro-economic sustainability targets. Achieving gender equality outside of schools is also unlikely to be achieved in the time remaining.

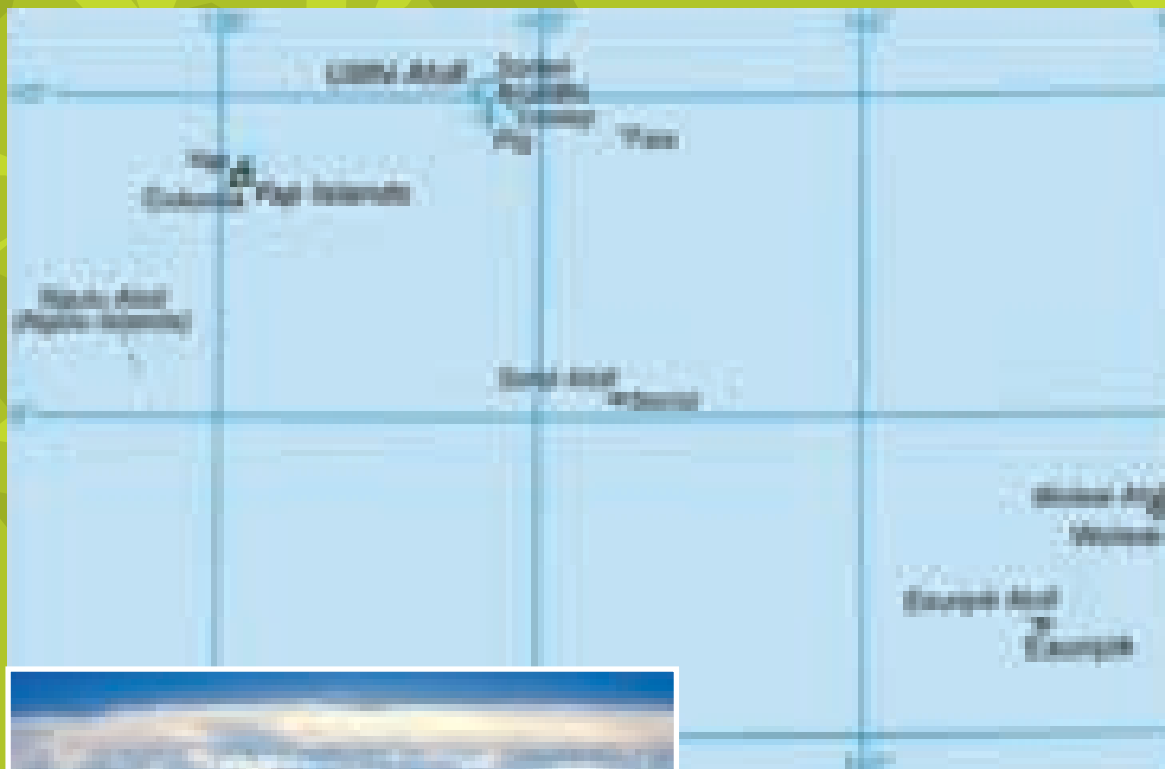
Selected MDG Indicators for POHNPEI STATE

MDG, Target, Indicator	Year	National	POHNPEI	Source
MDG 1. Poverty, Hardship, Hunger				
Target 1.A. Reduce poverty levels				
Food poverty line	2005	\$5,027	\$4,882	HIES, 2005 Abbott, 2008
Basic needs poverty line	2005	\$8,031	\$8,508	
Households below food poverty line	2005	7.8%	6.8%	
Households below basic needs poverty line	2005	22.4%	24.4%	
Persons below food poverty line	2005	11.0%	10.9%	
Persons below basic needs poverty line	2005	29.9%	33.9%	
Poverty gap ratio (depth of poverty)	2005	9.3	10.8	
Squared poverty gap ratio (severity of poverty)	2005	4.0	5.1	
Expenditure share of poorest quintile of households (20%) of households	2005	8.5%	8.4%	
Ratio of expenditures in the lowest expenditure quintile (20%) of households to the highest expenditure quintile of households (Q1:Q5)	2005	4.2	4.1	
Gini coefficient (income equality)	2005	0.27	0.27	
Target 1.B. Employment				
GDP per person employed (formal sector)	FY 95 FY 09	\$13,069 \$13,939	\$13,623 \$13,175	McKinley, et al., 2010
GDP per person employed (growth rate)		0.4%	-0.2%	
Population employed (formal sector)	2008	14.0%	21.3%	
Persons 15+ in labor force (%) - Total/Male/Female	2000	59/67/50%	58/67/48%	Census
Labor force in formal sector jobs (%) - Total/Male/Female	2000	37/44/39%	42/47/34%	
Labor force unemployed (%) - Total/Male/Female	2000	22/21/24%	13/13/13%	
Working poor (households in lowest 30% expenditure with one or more worker)	2005	77.9%	88%	HIES
Target 1.C. Hunger				
Prevalence of underweight children under-five years of age	---	No data	No data	---
Proportion of population below minimum dietary energy consumption	---	No data	No data	---
MDG 2. Education				
Target 2.A. Universal primary education				
Gross enrollment - Preprimary (total/male/female) - Primary (total/male/female) - Secondary (total/male/female)	2000	68/63/74% 97/98/95% 79/83/75%	19/18/20% 89/88/89% 59/55/62%	Census
Net enrollment - Preprimary - Primary - Secondary	2009	34% 96% 69%	35% 108% 67%	FSM Dept of Education (JEMCO)
Literacy rate 15-24 year olds - 15-19 year olds - 20-24 year olds	2000	95.4% 94.7%	97.8% 97.6%	Census

	Year	National	POHNPEI	Source
Education, continued...				
Universal primary education continued...				
Primary and secondary teachers with a college degree	SY07-8	62.5%	79.0%	FSM DOE (JEMCO)
MDG 3. Promote gender equality and empower women				
Target 3-A. Equality in education				
Ratio of girls to boys primary education	SY08-09	0.96	0.96	FSM Dept. of Education (JEMCO)
Ratio of girls to boys secondary educ.		1.02	1.02	
Ratio of girls to boys enrolled in COM		1.14	1.12	
Ratio women to men in wage employment	2000	0.49	0.52	Census
Ratio of women to men earnings	2000	0.87	No data	Census
Legislative seats held by women	2007	0	2	FSM SBOC
Legislative compliance with CEDAW - Full/partial/out-of-compliance	2004	27/16/57%	32/15/53%	iknowpolitics.org
MDG 4. Reduce child mortality				
Target 4-A. Reduce infant and child mortality by two-thirds				
Infant mortality rates (infant deaths per 1,000 live births)	2009	13	4.0	FSM DHSA; civil registration
Under 5 mortality (deaths among children 0-59 months of age per 1,000 live births)	2009	NAv	NAv	FSM DHSA
Deaths among children 1-14/100,000 children ages 1-14	2009	35.9	0.0	FSM DHSA
Fully immunized (% children 2 years old)	2009	67.8%	58%	FSM DHSA
Infants (%) breastfeeding at 6 months	2009	73.4%	53.4%	FSM DHSA
MDG 5. Maternal Health				
Target 5-A. Reduce maternal mortality by three-quarters				
Maternal mortality ratio (maternal deaths per 100,000 live births)	1999-2009	161	108	FSM DHSA; Civil registration
Births (%) attended by skilled personnel	2008	90%	96.9%	Statistical Yearbook 2008
Target 5-B. Ensure universal access to reproductive health services				
Contraceptive prevalence rate (women 15-49 years of age using modern family planning methods)	2009	40%	NAv	FSM DHSA
Adolescent birth rate (births to women 15-19 years of age per 1,000 women)	2006	42.5	73.7	FSM Statistical Yearbook 2008
Births (%) preceded by at least one antenatal visit	2004	92%	NAv	FSM DHSA
Births (%) preceded by at least 4 antenatal visits	---	NAv	NAv	---
Births (%) preceded by antenatal care scoring 80% on the Kotelchuk Index	2009	60%	48.8%	FSM DHSA
Unmet need for family planning services (sexually active women not using contraception & not wanting children at this time)	---	NAv	NAv	---

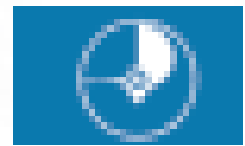
	Year	National	POHNPEI	Source
MDG 6. HIV and AIDS, Malaria, Tuberculosis and Other Diseases				
Target 6-A. Halt and begin to reverse the spread of HIV-AIDS				
Cumulative prevalence rate (cases per 100,000 population)	1989-2009	34.6	23.2	FSM DHSA
Condom use at last high risk sex (youth)	2007	---	35%	Second Generation Survey
Youth with a good knowledge of prevention and transmission	2007	---	26%	
Target 6-B. Halt and begin to reverse the incidence of tuberculosis				
Incidence rate per 100,000 population	2008	146	108.9	FSM DHSA
Prevalence rate per 100,000 population	2008	168	117.5	
Death rate per 100,000 population	2008	14.8	8.6	
DOTS coverage	2008	100%	100%	
Target 6.C. Halt and begin to reverse the spread of NCDs (cancer and diabetes mellitus)				
Pohnpei Step-wise survey 2002 (note follow-up survey now in progress)				
Diabetes prevalence (ages 25-64)	2002	No Nat'l data	21.2%	STEP-wise survey
Tobacco use (ages 25-64; smokers/smokeless tobacco users)	2002		31.6/11.4%	
Physically inactive (ages 25-64)	2002		64.3%	
Overweight or obese (ages 25-64)	2002		73.1%	
Persons with 0 risk factor (total/male/female)	2002		1/1.4/0.4%	
Persons with 1-2 risk factors (total/male/female)	2002		42/45/39%	
Persons with 3-5 risk factors (total/male/female)	2002		57/53/61%	
MDG 7. Environmental Sustainability				
Target 7-A. Integrate the principles of sustainable development into policies and programs; reverse the loss of environmental resources				
Land area covered by forests (%)	2007	89%	93%	US Forest Serv.
Water resource utilization (Kolonias only)				SPREP
- Normal conditions		23%	10%	
- Drought conditions		37%	15%	
Target 7-B. Reduce biodiversity loss and by 2010, achieve a significant reversal of loss				
Area in protection status - Marine/Terrestria	2010	6/15%	27/19%	FSM R&D
Target 7-C. Halve the proportion of the population without sustainable access to improved water and sanitation				
Access to improved drinking water	2005	57%	77%	HIES
Access to improved sanitation	2000	25%	31%	Census
Households with toilet facilities	2005	73%	80%	HIES
Target 7-D. By 2020 to have achieved significant improvement in the lives of urban slum dwellers				
Households with security of tenure	2000	94%	95%	Census

Indicator/Target	Year	National	POHNPEI	Source
MDG 8. Forge global partnerships for development				
Target 8-A. Develop an open, rule-based, predictable, non-discriminatory trading and financial system				
Government revenue & ODA as % of GDP	FY 09	84%	31%	McKinley, et al., 2010
ODA as % of government revenue		68%	66%	
ODA as % of GDP		57%	21%	
Target 8-B. Address the special needs of least developed countries.				
Not applicable to the FSM				---
Target 8-C. Address the special need of small island developing states				
Indicators not measurable sub-nationally				---
Target 8-D. Deal comprehensively with the debt problems of developing countries				
Indicators not measurable sub-nationally				---
Target 8-E. With pharmaceutical companies, provide access to affordable essential drugs				
Data unavailable to measure as indicator is stated				---
Target 8-F. Make available the benefits of new technologies, especially information and communications				
Telephone lines per 1,000 population	2005	108.3	165.9	FSMTC
Internet subscribers per 1,000 population	2005	15.8	25	
Cellular subscribers per 1,000 population	2007	213.1	310	StatisticalYearbook



Section 3.5.

MDGs and YAP STATE



State Overview

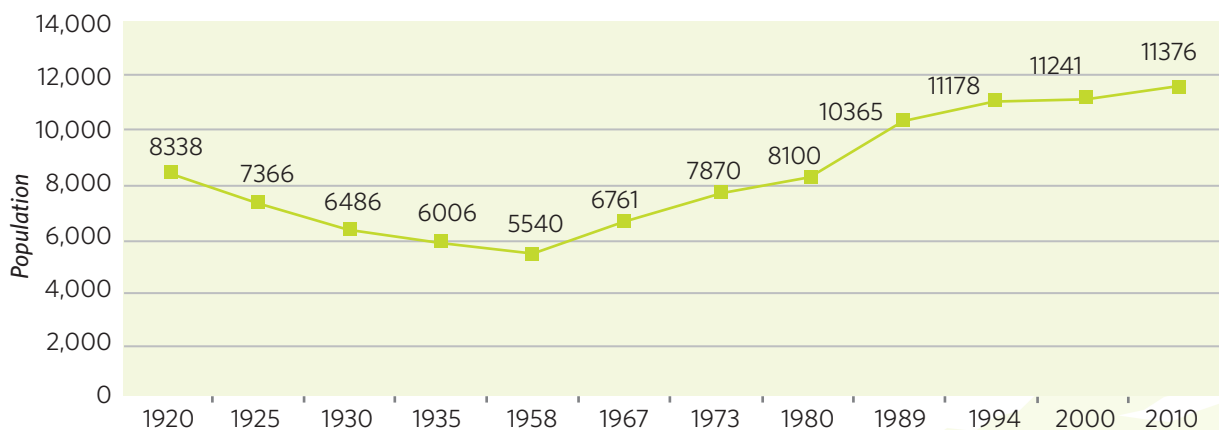
Located at 7o-9o north latitude and 137o-148o east longitude, Yap is the westernmost state in the FSM. Yap is made-up of 12 inhabited island units spread over 100,000 square miles of Ocean. Yap Proper has 38.7 square miles of land area and is comprised of four closely associated islands (Maraba'-Numail, Gagil-Tomil, Maap, Rumung and eight smaller islets dotting the fringing reef). Beyond Yap Proper, there are 134 outer islands of which 22 are inhabited. The total land area is 49.7 square miles; the total lagoon area is 405 square miles.

The population in 2000 was 11,241 (census data) and in 2010, 11,376 (provisional census data), an increase of 1.2%. The 2010 population density was 247. Population growth rates have hovered around 1% per annum since the 1980's; the median age in 2000 was 21 (national 18.9). Although total fertility increased between 1994 and 2000 (3.7 to 4.2 births per woman) it dropped subsequently (2.5, 2006 civil registration). Yap's total (completed) fertility rate is lower than the national average (national 2.7, 2006 data).

Yap was settled over 3,000 years ago by voyagers from the Philippines and Indonesia (Yap DOE, 2007). Today, Yap is the most traditional state in the FSM and the greater Micronesian region. On the main island, the Yapese society has a caste system consisting of seven levels. People are recognized and respected according to their villages. This is a society where the caste system survives and where village chiefs hold both traditional and political power (Yap DOE, 2007). Each outer island group also has its own unique cultural identity and customs. Four major languages are spoken: Yapese, Ulithian, Woleaian, and Satawalese. These languages, along with English, are the official languages of the state (Yap DOE, 2007).

Yap has its own constitutional government with three equal branches consisting of the executive, legislative, and judiciary. Yap also has a traditional system of governance - Council of Pilung and the Council of Tamol - that addresses matters relating to traditions and customs. The executive branch is headed by a governor and a lieutenant governor who administer state government services with the assistance of 8 cabinet members. The legislature is comprised of ten members elected by voters of their respective election districts. The judicial function is vested in a State Supreme Court comprised of a Chief Justice and two Associate Justices.

Yap Population 1920-2010
Source: 2000 Census, Volume II



MDG 1 - Poverty and Hardship

Although Yap saw a modest increase in poverty levels between 1998 and 2005 (HIES data), the overall poverty situation is favorable despite the fact that cost of living is the highest among the four states. The incidence of absolute poverty (households living below the food poverty line) is one-quarter the national average (2% versus 8% nationally, 2005 data) while the incidence of relative poverty (households below the basic needs poverty line) is half the national average (11% versus 22%). Poverty is less severe in Yap than elsewhere as indicated by the poverty gap index (Yap 5.2 versus national 9.3, 2005 data). Inter-household income inequality is also the lowest among the four states.

Yap has the highest proportion of household income derived from subsistence production (30% average; 40% among the lowest income households and 22% among the highest income households). Remittances in Yap are not a significant source of income averaging only 0.5% of average household income (Household Income and Expenditure Survey, 2005).

Despite being a very traditional patrilineal society, Yap is the only state in the FSM where female-headed households do not appear to be at significant economic disadvantage. The level of working poor here is also the lowest in the FSM suggesting that wages are keeping pace with the cost of living.

One of the reasons that Yap has a favorable poverty profile is that it also has a favorable employment profile. Labor force participation levels for both men and women are higher than the national average (Yap 69% versus national, 59%, 2000 Census). Gross Domestic Product per employed person (wage-salary sector) is also higher than the national average indicating high levels of labor productivity (Yap, \$14,935; national, \$13,939, 2009 data by McKinley, et al.).

Anemia and Vitamin A Deficiency in Yap Proper, 2000 Survey Data; Yap Department of Health

	Children 3-5 years of age	Mothers of children surveyed
Vitamin A deficiency	38.1%	11.7%
Anemia	11.0%	18.1%

In terms of hunger and malnutrition, no data are available at national levels that directly relate to these indicators.⁷⁴ Although not a MDG indicator or directly linked to poverty, it is worth noting that a 2000 survey conducted in Yap Proper found high levels of Vitamin A deficiency and anemia among children (under age 5) and women of childbearing ages (see table). Vitamin A deficiency and anemia, however, are not directly associated with poverty in many populations.

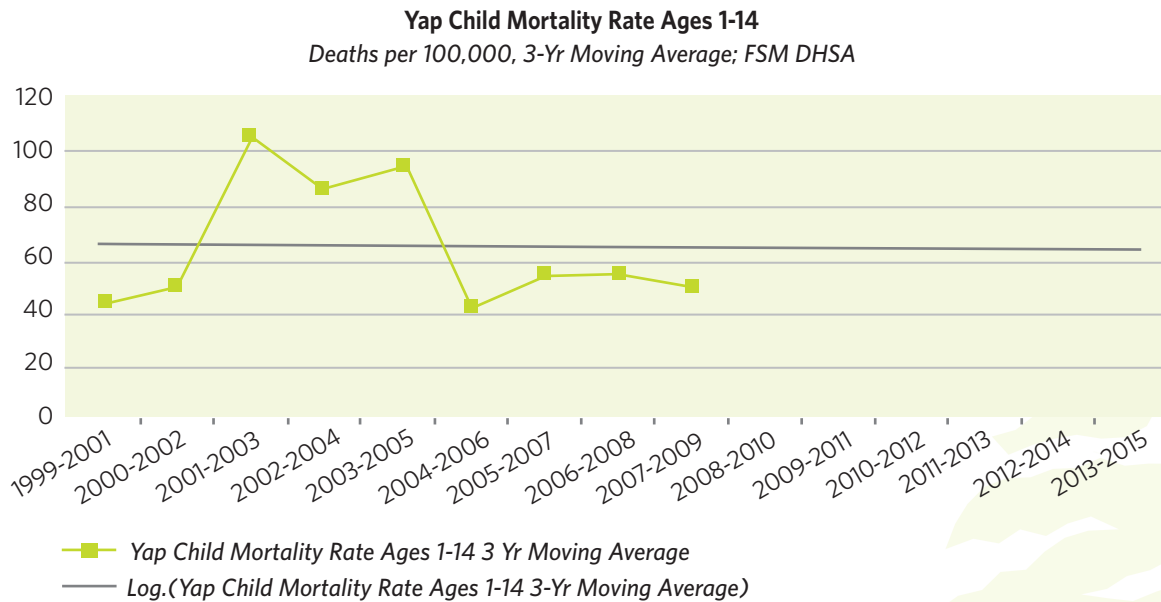
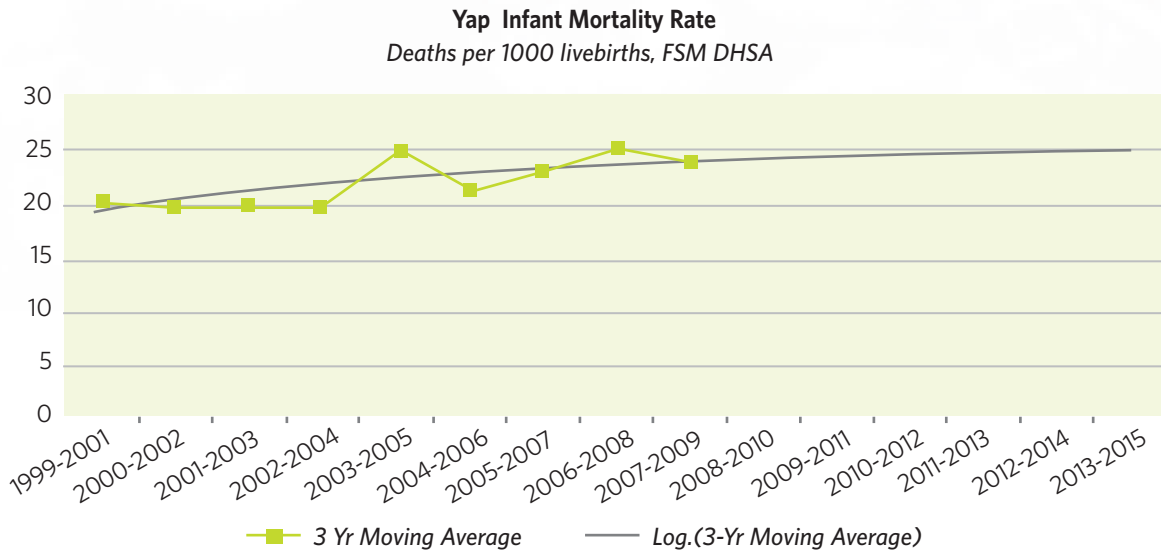
MDG 2 - Education

Gross enrollment rates in Yap are close to the national average. Net enrollment levels for pre-primary and secondary schools are well above the national average but primary enrollment rates are lower than the national average. The net enrollment for primary schools, although based on Yap State reports to the national government, may be erroneous since it is not logical that the state would have high net enrollment in pre-primary and secondary schools but low net enrollment in primary schools. There is some evidence of gender bias in the data with girls having lower participation rates than boys and markedly lower school survival rates. For the SY 97-98 cohort primary school survival to 8th grade 83% for boys and 79% for girls; survival to 10th grade was 70% for boys and 55% for girls. As noted in previous discussion around MDG 2, school survival rates measure attrition from all causes including drop-outs, transfers, and migration. It is probable, however, that the actual drop-out rate is higher than the official drop-out rate of 2% (national data). Almost universal literacy has been achieved among persons 15-24 years of age with no evidence of gender bias in this statistic.

⁷⁴ Child malnutrition is not an indicator that is monitored by the National Department of Health.

MDG 3 - Gender

As noted the ratio of girls to boys in school and the primary school survival rate suggest some gender bias especially at the secondary level. Undoubtedly the fact that most outer island children must leave their islands to attend boarding high schools may lower female secondary participation rates in this highly conservative society. Some education officials in Yap have commented that pregnancy among female students is a common reason for girls to withdraw from school. These same officials note, however, that pregnant female students tend to withdraw temporarily and then return to school after giving birth.



As previously noted, Yap residents have much higher rates of labor force participation than the national average. This is true for both men and women (participation rates 73% for men and 72% for women, 2000 Census). Although women are twice as likely to be employed in the non-formal subsistence sector as men, the ratio of women-to-men in wage and salary employment is still the highest in the FSM (0.70, 2000 Census).

Like their counterparts throughout the FSM, women in Yap are still under-represented in elected offices although women do fare better at senior levels of the executive branch; two of the eight current cabinet officers are women. The rate of legislative compliance with CEDAW is about the same in Yap as elsewhere in the FSM (Yap 26% in compliance; national 27%).

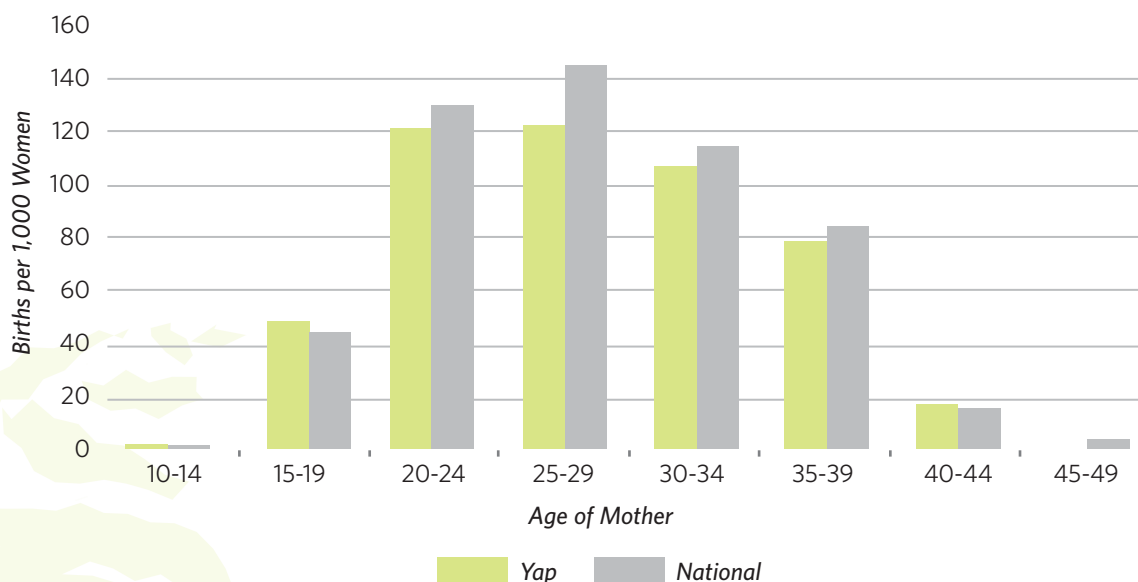
MDG 4 - Child Health

The Yap Department of Health has been a leader in the Micronesia Region in development of community-based primary health care. High immunization levels are evidence of the success of the Yap approach (Yap completed immunization rate at 2 years of age, 84%; national 68%). Despite developments in primary health care, Yap is the only state where infant mortality rates are increasing rather than decreasing (see figure). This apparent increase, however, warrants closer investigation because Yap's small population can distort data. Child mortality rates (ages 1-14) are flat (see figure). While Yap has the infrastructure needed to achieve MDG 4 by 2015, clearly a great deal more effort will be needed in light of current trends. Given the highly traditional nature of Yapese society, it is surprising that breastfeeding rates at 6-months of age are markedly lower than the national average (Yap, 52%; National 73%).

MDG 5 - Maternal Health

Yap's total fertility rate is slightly lower than the national average (Yap 2.4; National 2.7) with adolescent and late-life fertility slightly higher than the national averages (see figure below).

Age Specific Fertility Rate YAP
Births per 1,000 Women, FSM Statistical Yearbook, 2008



Between 1999 and 2009, Yap reported 12 maternal deaths yielding an average ratio of 462 deaths per 100,000 births (national average 161). This is an extremely high death ratio although in view of the small numbers, it must be interpreted with caution since one death more or less can change the MMR by 50 points.

Yap's high maternal mortality ratio is incongruent with other maternal health indicators. Yap has trained a network of female certified birth attendants for the outer islands and has subsequently achieved 100% supervised delivery. Sixty percent of births are rated as 80% or higher on the Kotelchuk Index, a figure identical to the national average.

MDG 6 - Other Diseases

The cumulative (1989-2009) HIV-AIDS rate in Yap is half the FSM national rate. Evidence from a Second Generation Youth Survey there (SPC and FSM DHSA, 2008), however, is that a significant number of young people continue to put themselves at risk by having unprotected sex with multiple partners. The level of knowledge about HIV-AIDS prevention and transmission is quite low; a mere 12% of youth surveyed exhibited "good" levels of knowledge. This may reflect the highly traditional and conservative nature of the society that frowns on free discussion of sexual matters. Tuberculosis rates are one-third the national average and cure rates are more than double the national average. This is an indicator of a good primary health care system.

Data relating to NCDs in Yap is sparse. A Step-wise survey sponsored by the World Health Organization is underway; once completed, the survey will provide information about the prevalence of diabetes and hypertension and the leading risk factors for these diseases (tobacco use, alcohol abuse, overweight and obesity, physical activity, and dietary habits).

MDG 7 - Environmental Sustainability

Yap has a diverse ecosystem with high levels of endemism. There is a strong traditional conservation ethic and commitment at all levels of society to "Taking Care of Yap."⁷⁵ The state, however, has seen widespread conversion of primary forests to other uses and now has the lowest forest cover among the four states of the FSM (Yap, 72%; national average 89%, 2006-2007 data). Although this may seem to be a high level of forest coverage, only a small proportion is primary forest which is of greatest importance for biodiversity.

Yap has extended formal protection to 10% of its in-shore marine area within the central islands but has as yet, not formally designated any terrestrial protected areas (Note that these figures do not include the outer islands and informal "community" protected sites).

Yap has slightly higher levels of access to improved drinking water than the national average (61% of households versus 57% nationally, 2005 data). This is despite a large number of outer islands dependent on unimproved ground water or household catchments. Yap has a higher proportion of households with toilet facilities than the national average (41% versus 27% nationally, 2005 data) but about the same proportion of households served by sewer or septic systems (25% versus 24%, 2000 Census).

MDG 8 - Partnerships for Development

The Yap economy is less dependent on government than the national average with government contributing 53% of the state's GDP (national average 84%, FY 2009 data by McKinley). Like the other FSM states, the Yap Government continues to rely heavily on ODA (inclusive of COFA funding) for both recurrent and capital expenditures.

Yap has a relatively high proportion of its population with telephone, cellular and internet access. Most other indicators, however, for MDG 8 cannot be measured at the sub-national level.

⁷⁵ "Taking Care of Yap" is the theme of Yap's 2004 Biodiversity Strategic Action Plan.

Conclusion

On all the economic indicators, Yap is doing very well. Employment levels are well above the national average and poverty levels are well below the national average despite high cost of living. Although a very traditional society, women have made significant inroads into economic life despite some evidence of gender bias in education. As elsewhere in the FSM, women have not yet made inroads into politics although women have been successful in gaining appointments and serving with distinction at the highest appointive levels of government. Although Yap has a well regarded primary health care system evidenced by high levels of immunization and progress against tuberculosis, the upward trend in infant mortality is troubling as is the high maternal mortality ratio. Small number, however, mean that rates and ratios must be interpreted with caution.

Yap's traditional conservation ethic and management system are well known in conservation circles but despite these, threats to the environment abound as more people seek to make their livelihood from the non-formal sector using modern means of resource extraction. Conversion of the small remaining areas of primary forests to other uses is a particularly acute problem that threatens biodiversity.

Yap's progress toward the MDGs is mixed. It has the education and health infrastructure required to achieve most social targets (MDGs 2, 4, 5, and 6) by 2015 but there will need to be a significant acceleration of targeted effort if this is to occur. Yap also has the infrastructure to achieve MDG 7 by 2015, especially the Micronesian Challenge target of protecting 30% of near-shore marine areas and 20% of terrestrial areas, but again acceleration of effort is imperative.

Selected MDG Indicators for YAP STATE				
MDG, Target, Indicator	Year	National	YAP	Source
MDG 1. Poverty, Hardship, Hunger				
Target 1.A. Reduce poverty levels				
Food poverty line	2005	\$5,027	\$6,394	2005 HIES; Abbott, 2008
Basic needs poverty line	2005	\$8,031	\$9,700	
Households below food poverty line	2005	7.8%	2.0%	
Households below basic needs poverty line	2005	22.4%	11.4%	
Persons below food poverty line	2005	11.0%	4.0%	
Persons below basic needs poverty line	2005	29.9%	19.4%	
Poverty gap ratio (depth of poverty)	2005	9.3	5.2	
Squared poverty gap ratio (severity of poverty)	2005	4.0	1.7	
Expenditure share of poorest quintile of households (20%) of households	2005	8.5%	11.1%	
Ratio of expenditures in the lowest expenditure quintile (20%) of households to the highest expenditure quintile of households (Q1:Q5)	2005	4.2	3.2	
Gini coefficient (household income equality)	2005	0.27	0.24	
Target 1.B. Employment				
GDP per person employed (wage and salary sector)	FY95 FY08	\$13,069 \$13,939	\$13,927 \$14,936	McKinley, et al., 2010
GDP per person employed (growth rate)		0.4%	0.5%	
Population employed (wage and salary sector)	2008	14.0%	21.2%	
Persons 15+ years of age in labor force (%) - Total/Male/Female	2000	59/67/50%	69/70/68%	Census
Labor force in wage and salary jobs (%) - Total/Male/Female	2000	37/44/39%	44/57/31%	
Labor force unemployed (%) - Total/Male/Female	2000	22/21/24%	4/6/3%	
Working poor (households in lowest 30% expenditure with one or more workers)	2005	77.9%	66.9%	HIES
Target 1.C. Hunger				
Prevalence of underweight children under-five years of age	---	No data	No data	---
Proportion of population below minimum dietary energy consumption	---	No data	No data	---
MDG 2. Education				
Target 2.A. Universal primary education				
Gross enrollment - Preprimary (total/male/female) - Primary (total/male/female) - Secondary (total/male/female)	2000	68/63/74% 97/98/95% 79/83/75%	--- 92/92/93% 72/68/77%	Census
Net enrollment - Preprimary - Primary - Secondary	2009	34% 96% 69%	45% 68% 83%	FSM Dept of Education (JEMCO)

	Year	National	YAP	Source
Target 2-A. Universal primary education continued...				
Literacy rate 15-24 year olds - 15-19 year olds - 20-24 year olds	2000	95.4% 94.7%	98.4% 97.5%	Census
Teachers with a college degree	SY 2007	65.2%	36.8%	FSM DOE (JEMCO)
MDG 3. Promote gender equality and empower women				
Target 3-A. Equality in education				
Ratio of girls to boys primary education	SY08-09	0.96	0.90	FSM Dept. of Education (JEMCO)
Ratio of girls to boys secondary educ.		1.02	0.83	
Ratio of girls to boys enrolled in COM		1.14	1.20	
Ratio women to men in wage employment	2000	0.49	0.70	Census
Ratio of women to men earnings	2000	0.87	NAv	Census
Legislative seats held by women	2007	0.0	0.0	FSM SBOC
Legislative compliance with CEDAW - Full/partial/out-of-compliance	2004	27/16/57%	26/14/60%	iknowpolitics.org
MDG 4. Reduce child mortality				
Target 4-A. Reduce infant and child mortality by two-thirds				
Infant mortality rates (infant deaths per 1,000 live births)	2009	13	17	FSM DHSA; civil registration
Under 5 mortality (deaths among children 0-59 months of age per 1,000 live births)	2009	NAv	NAv	FSM DHSA
Deaths among children 1-14/100,000 children ages 1-14	2009	35.9	0.0	FSM DHSA
Fully immunized (% children 2 years old)	2009	67.8%	84.0%	FSM DHSA
Infants (%) breastfeeding at 6 months	2009	73.4%	52.0%	FSM DHSA
MDG 5. Maternal Health				
Target 5-A. Reduce maternal mortality by three-quarters				
Maternal mortality ratio (maternal deaths per 100,000 live births)	1999-2009	161	462	FSM DHSA; Civil registration
Births (%) attended by skilled personnel	2008	90%	100%	Statistical Yearbook 2008
Target 5-B. By 2015, achieve universal access to reproductive health services.				
Contraceptive prevalence rate (women 15-49 years of age using modern family planning methods)	2009	40%	NAv	FSM DHSA
Adolescent birth rate (births to women 15-19 years of age per 1,000 women)	2006	42.5	47.8	FSM Statistical Yearbook 2008
Births (%) preceded by at least one antenatal visit	2004	92%	NAv.	FSM DHSA
Births (%) preceded by at least 4 antenatal visits	---	NAv	NAv	
Births (%) preceded by antenatal care scoring 80% on the Kotelchuk Index	2009	60%	60.5%	FSM DHSA
Unmet need for family planning services (sexually active women not using contraception & not wanting children at this time)	---	NAv	NAv	---

	Year	National	Yap	Source
MDG 6. HIV and AIDS, Malaria, Tuberculosis and Other Diseases				
Target 6-A. Halt and begin to reverse the spread of HIV-AIDS				
Cumulative prevalence rate (per 100,000 population 1989-2009)	1989-2009	34.6	17.8	FSM DHSA
Condom use at last high risk sex (youth)	2007	---	33%	Second generation study
Youth with good knowledge of prevention and transmission	2007	---	12%	
Target 6-B. Halt and being to reverse the incidence of tuberculosis				
Incidence rate per 100,000 population	2008	146	51	FSM DHSA
Prevalence rate per 100,000 population	2008	168	51	
Death rate per 100,000 population	2008	14.8	0.0	
DOTS coverage	2008	100%	100%	
Target 6.C. Halt and begin to reverse the spread of NCDs (cancer and diabetes mellitus)				
Yap survey work in progress.	---	No Nat'l data	---	STEPS pending
MDG 7. Environmental Sustainability				
Target 7-A. Integrate the principles of sustainable development into policies and programs; reverse the loss of environmental resources				
Land area covered by forests (%)	2006-7	89%	72%	U.S. Forest Serv.
Water resource utilization (Yap Proper)		23%	37%	SPREP
- Normal conditions		37%	58%	
- Drought conditions				
Target 7-B. Reduce biodiversity loss and by 2010, achieve a significant reversal of loss				
Area in protection status - Marine/Terrestrial	2010	6%/15%	10%/0.0%	FSM R&D
Target 7-C. Halve the proportion of the population without sustainable access to improved water and sanitation				
Access to improved drinking water	2005	57%	61%	HIES
Access to improved sanitation		25%	24%	Census
Households with toilet facilities		73%	59%	HIES
Target 7-D. By 2020 to have achieved significant improvement in the lives of urban slum dwellers				
Households with security of tenure	2000	94%	98%	Census
MDG 8. Forge global partnerships for development				
Target 8-A. Develop an open, rule-based, predictable, non-discriminatory trading and financial system				
Government revenue & grants % of GDP	FY 09	84%	53%	McKinley, et al., 2010
ODA as % of Government revenue		68%	73%	
ODA as % of GPD		57%	39%	

Target 8-B. Address the special needs of least developed countries				
Not applicable to the FSM				---
Target 8-C. Address the special need of small island developing states				
Indicators not measurable sub-nationally				---
Target 8-D. Deal comprehensively with the debt problems of developing countries				
Indicators not measurable sub-nationally				---
Target 8-E. With pharmaceutical companies, provide access to affordable essential drugs				
Data unavailable to measure as state.				---
Target 8-F. Make available the benefits of new technologies, especially information and communications				
Telephone lines per 1,000 population	2005	108.3	179.6	FSMTC
Internet subscriptions per 1,000 pop.	2005	15.8	23.2	
Cellular subscribers per 1,000 population	2007	213.1	371.3	FSM Statistics



Section 4. 2015 and Beyond

Section 4.

2015 and Beyond

At the national level, the FSM MDG Task Force has worked hard for six long years to “own” the MDGs and produce this initial status report. Their efforts reflect a high level of dedication to the task as well as strong support from national leaders in both the Executive and Legislative branches of government. Each member of the Task Force must be commended for his/her fortitude. Unfortunately, the status report is but a milestone on a long journey. Now the real work begins of aggressively accelerating efforts to move the FSM as far as possible toward the MDGs in the five years remaining prior to 2015. This work will require simultaneous action on several fronts.

Task #1. Expand Ownership of the MDGs

It is good that the MDGs have come to be “owned” at the national level. Due to the structure of the FSM government, however, the national government can “set the stage” for implementation but most of the implementation work required to achieve the MDGs will take place at the state level or in some cases (such as MDG 7), at the community level. The National MDG Task Force must, therefore, accelerate efforts to facilitate ownership of the MDGs within the states and communities.

- 1.1. MDG focal points must be identified and formally recognized in each state. Focal points will serve as liaison between the National Task Force, the state government, and communities. While it is natural to look to state government for identification of a focal point, it is important to also look to civil society. It may be beneficial to identify co-focal points, one from government and one from civil society, in order to hasten the transfer of ownership directly to communities.
- 1.2. MDG working groups must be formed in each state. These working groups should include at the outset representation from both government and civil society. The State MDG working groups will initially have a three-pronged work program to:
 - Improve on the state-specific summaries found in the national report (Section 3) in order to better assess the status of the MDGs at the state level, and where feasible at the municipal level;
 - Build awareness about the MDGs throughout the state; and
 - Facilitate implementation of the MDGs in the state by integrating the MDGs within state planning and budgeting processes.

Task #2. Further Localize the MDGs

The process of localizing the MDGs has begun in this initial report. Where no data exists, new sentinel indicators have been used where possible to measure the “spirit” if not the “letter” of the official MDG target or indicator. Additional targets and indicators have been added selectively as in the case of education (secondary school participation rates and qualitative indicators) and health (non-communicable diseases). Keeping in mind that the MDGs are meant to be a relatively short list of key indicators, the national MDG Task Force in cooperation with SBOC and state task forces, should critically review current indicators with a view toward selectively adding indicators that are important for monitoring the priorities of the FSM.

For those indicators where the nation (or individual states) fall well short of global targets, it may be beneficial for the national and/or state MDG Task Forces to identify less ambitious but achievable targets that will advance both local and global development agendas. At the regional level, PNG, which falls short of most social targets, is achieving good success with this approach. It has previously been suggested (Section 3 of this report) that such an approach could be beneficial in the State of Chuuk which falls well short of poverty and employment related indicators and possibly in Yap, which falls well short of several social indicators, notably infant, child, and maternal mortality.

Task #3. Communicate

The Initial MDG Status Report is admittedly an imperfect document. It could benefit from further state level consultations and data collection. Its imperfections, however, should serve as an excuse for failing to maximize its use to raise awareness and stimulate action at national, state, and community levels. For this, the national and state MDG Task Forces will need to prepare a detailed communication plan to include some of the activities listed below.

- 3.1. Disseminate the initial status report to government and civil society leaders at state and national levels. Unfortunately, the reality is that only a few who receive the report will read it and even fewer will act on it. While sharing the report is essential, this activity alone does not constitute effective communications.
- 3.2. Identified MDG trainers in each state and support them with the information and skills needed to understand the MDGs and the national report and communicate this information in their communities.
- 3.3. Summarize the report in a user friendly pamphlet format (what the MDG says; what the status of the nation and the state is with respect to the MDG; what needs to be done to achieve the MDG); these pamphlets (one for each state) should be translated into the major local languages and printed for wide dissemination.
- 3.4. If resources permit, radio and video formats can be used to put a “human face” on the MDGs to build support at all levels of society.
- 3.5. Identify and use non-formal “social” media to raise awareness about the MDGs.
- 3.6. Continue to integrate discussion of the MDGs into all national and state meetings, workshops, and conferences.

Task #4. Monitor Progress

The initial MDG status report will be obsolete even before it is printed. It is important that the MDG Task Forces (state and national) keep pace with developments by ensuring information is available to continuously monitor implementation status.

- 4.1 The MDG Task Force and FSM SBOC need to work together to ensure that the data (numerator and denominator) needed to compile all MDG indicators are included in the annual Statistical Yearbook.⁷⁶ It is further recommended that a chapter be added to the Yearbook to report on MDG indicators disaggregated by state even if such a chapter duplicates other tables found in the standard Yearbook format.
- 4.2 For Health and Education, MDG indicators need to be integrated into standard databases. For Education this is the annual JEMCO report. For Health this is the annual Maternal and Child Health Data Matrix. Special attention needs to be paid to:
 - Under Five Mortality Rate (U5MR);
 - Births preceded by one and four antenatal visits;
 - Contraceptive prevalence.

The information necessary to produce all three indicators is available in the FSM health statistics system but is not being used to produce what are by now standard international indicators.

- 4.3 Data relevant to “unmet need for contraceptive services” together with a wealth of supplemental information relating to maternal risk factors could be collected easily and cheaply by instituting a “PRAMS-like” survey within antenatal clinics and obstetric units.
- 4.4 The MDG Task Force and FSM SBOC need to work with the Social Security Administration to begin disaggregating employment statistics by gender. This action is critical for monitoring the status of MDGs 1 and 3.
- 4.5 The MDG Task Force needs to update the National MDG report by integrating data from the 2010 Census as soon as these data become available (circa mid-2011). Census data are particularly critical for assessing progress vis-à-vis the mortality indicators (infant, child, and maternal).⁷⁷
- 4.6 The MDG Task Force needs to work with SBOC to identify sentinel indicators for poverty that can be measured annually and ensure these data are integrated into the Annual Statistical Yearbook.

⁷⁶ Data not currently included: nutrition status of children; employment statistics disaggregated by gender; net enrollment in school disaggregated by gender; standardized test results disaggregated by state and gender; deaths among children 1-4 years of age (needed to calculate under five mortality rate); one-year old children receiving MMR1 vaccination; two year old children fully immunized (data collected by DHSA but not included in the Statistical Yearbook); maternal deaths; contraceptive prevalence; tuberculosis and NCD prevalence.

⁷⁷ On the advice of the FSM Department of Health and Social Affairs, the Initial Status report has used civil registration data to conclude that the FSM is “on track” with respect to infant, child, and maternal mortality targets. Census data will provide a “check” on civil registration data.

- 4.7 For NCDs, data from the STEP-wise surveys completed but not published in Chuuk and in progress in Pohnpei, Yap, and Kosrae are vitally needed, not just to monitor the MDGs but to make critical decisions about programming. To prevent future lengthy delays in producing reports, FSM should develop local capacity to analyze these surveys and should allow external agencies to take only copies of data for their own analytic purposes.
- 4.8 The MDG Task Force needs to work with the Department of Health to identify sentinel indicators for non-communicable diseases that can be measured annually.⁷⁸ Simple, readily accessible data such as the value/quantity of tobacco and alcohol imports and import/sale of certain sentinel foods can provide evidence of progress toward reducing NCD risk factors.

Task #5. Implement

Work to implement most of the MDGs is already a part of national and state programs and activities. While this work may benefit from reinforcement, it does not require direct involvement by the MDG Task Force. The MDG that does require direct involvement by the Task Force is MDG 1 (Poverty and Hardship). MDG 1 is a cross cutting goal that at present is not being addressed in the FSM in a comprehensive manner.

Although poverty alleviation is implied in the FSM Strategic Development Plan, it is not explicitly addressed anywhere in the document. The underlying assumption is that job growth through private sector development will “trickle down” to households and individuals in need thereby alleviating or preventing poverty. There is no doubt that employment and income are critical for poverty reduction. Countries that have been able to create the conditions necessary to achieve and sustain long-term economic growth have generally been able to reduce poverty rates. Nevertheless, while macroeconomic interventions are prerequisites for poverty prevention/alleviation, they are seldom adequate in themselves to achieve poverty objectives. This requires a more targeted approach that in the FSM may include the following steps.

- 5.1. Using GIS technology, map the three components of poverty defined by the ADB (poverty of services, poverty of opportunity, and poverty of expenditures/income). This will identify communities and geographic areas at greatest risk of poverty.
- 5.2. Using the results of the mapping exercise, develop population specific strategies to address hardship and need by combining macro-economic interventions with targeted anti-poverty interventions and involving the communities/households most affected in planning.
- 5.3. Develop a formal National Poverty Alleviation Strategy to be integrated into the National Sustainable Development Plan that links macro-economic interventions with population specific economic and non-economic interventions.

State MDG Task Forces, by nature of their composition, will be directly involved in implementation of measures that address MDG targets. In most cases the tasks required are well beyond the capacities of resource-strapped government departments. Successful implementation must draw on the energies and resources of civil society and communities themselves.

Conclusion

There is a proverb to the effect that “everybody’s work is nobody’s work.” The MDGs are truly “everybody’s work” because they cross cut the whole of society. Herein lays their strength and their weakness. In order to prevent “everybody’s work from becoming nobody’s work” the leadership of the National MDG Task Force is critical. Over a long process of study and analysis, the Task Force now “owns” the MDGs and it will largely be up to the Task Force to maintain and accelerate momentum within the states and civil society toward their implementation. Maintaining the national MDG Task Force and providing adequate staff support to enable it to continue to work efficiently and effectively is key to a successful outcome in moving the FSM forward not just toward the MDGs but also toward the national priorities for human development embedded in the FSM Strategic Development Plan.

⁷⁸ As one example, measuring tobacco use in the community requires expensive, time-consuming surveys but data on tobacco imports is already available and can be used as a proxy measure for tobacco use.

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