Gender Issues within the Population-Environment Nexus in Philippine Coastal Areas

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Abstract

Sixty percent of Philippine’s population resides in the coastal zone. Women and men in coastal communities depend chiefly on the sea for subsistence. Over fifty percent of the dietary protein requirements of coastal communities are derived from municipal fisheries and shallow coastal habitats (reef fishes, marine plants and mangroves). Coastal populations are young and expanding at rates that exceed regional and national averages. Expanding human pressures and man-made disturbances (over harvesting, destructive fishing, siltation etc.) that offset natural processes are destroying habitats and creating protein food security crises and increasing malnutrition. At the same time conflicts among users of coastal resources are escalating. Access constraints, gender inequities and cultural barriers stymie options for women and men to plan their families and create alternative livelihoods. National and local government agencies are addressing food security concerns through vertical policies and programs (e.g., fisheries management, integrated coastal management). The IPOPCORM project uses a cross-sectoral approach and quasi-experimental evaluation design to test the hypothesis that food security will be achieved more quickly when coastal resources management (CRM) and reproductive health (RH) management are implemented together. The purpose of this paper is to review the project’s experience and highlight the trends observed in program monitoring and evaluation during 2001-2004, which suggest better impact on RH, CRM and gender indicators in the sites where the synergistic approach is being applied.
Introduction and Rationale

The Philippines is an archipelagic nation of over 7,000 islands and the majority of the population resides in or near coastal areas. As a result, the Philippine population depends largely on its marine resources for food and livelihood. Tropical coral reefs are among the country’s most important and productive natural habitats, providing Filipinos with a vital food source and income generating opportunities. Coral reefs alone contribute at least US$1.35 billion annually to the country’s economy (White and Cruz-Trinidad, 1998). Approximately 1.3 million Filipinos derive direct income from the sea as small-scale fishers (Green et. al., 2003). Coastal tourism is thriving and Philippine beaches and reefs are world-renowned as recreation and dive destinations (White and Cruz-Trinidad, 1998). Finally, over fifty percent of the total animal protein consumed in the Philippines is derived from aquatic sources (Asian Development Bank, 2001).

Despite its importance, the Philippine marine environment is in crisis. The country’s coral reefs and the marine life they support have been severely impacted by the deadly combination of coastal population pressures, increased shoreline development, over fishing, and the rampant use of destructive fishing techniques such as cyanide and dynamite fishing. In fact, a survey of the 27,000 square kilometers of coral reefs in the country found that less than 5 percent are still in excellent condition (Gomez et. al. 1994). Tellingly, even with advances in fishing technologies the total fish catch in the country has not increased since 1975 and fishermen have to travel greater distances and stay out to sea longer to catch fish.

Yet, there is constant pressure to produce more fish and create more jobs for the Philippine population of 83 million and growing. Philippine coastal areas in particular are susceptible to these pressures since they are home to more than 60% of the country’s population (Weber, 1993). Coastal areas experience twice the rate of population growth as the rest of the country, and are more densely populated than other areas of the country. Another demographic dynamic that poses challenges to the environment is the high momentum of the coastal population, which is an important predictor of future pressure on coastal resources and ecosystems. Population momentum refers to the tendency for population growth to
continue beyond replacement-level fertility because of a high concentration of people in the childbearing years (Keyfitz, 1971). Up to 45% of people living in coastal areas are under the age of 15, a considerable increase over the overall Philippine rate of 37% and in comparison to other Asian countries like China where only 22% of the population is under age 15 (Herrin and Costello, 1996). The combination of high-unmet demand for family planning, low availability of contraceptive products and services, and a significant population of sexually active youth contribute to the high fertility that characterizes these communities (Castro et al, 2002). As a result, as Figure 1 demonstrates, more and more people are depending on fewer coastal resources for their food and livelihoods.

![Figure 1. Relationship between population growth and fish catch, Philippines 1950-2000.](image)

In 2001, the Integrated Population and Coastal Resource Management (IPOPCORM) project was launched to address population, environment and poverty links in Philippine coastal municipalities. Over six years, IPOPCORM aims to improve the quality of life of human communities that depend upon nearby coastal and marine resources, while maintaining biological diversity and productivity of coastal ecosystems. The central organizing theme of IPOPCORM is food security, assuring people’s access to a sustainable and predictable supply of nutritionally balanced food. The ‘linked eco-social systems’ theory provides a basis for linking reproductive health and the environment by assuming that small improvements in ecological and social systems reinforce one another to turn around both
systems from deterioration to health (Marten, 2001). The ecological and social systems improvements are achieved by linking three primary project objectives: improving reproductive health outcomes for coastal communities, enhancing local or community-based management of marine and coastal resources, and increasing the general public and policymaker’s awareness and support for linked reproductive health and coastal conservation activities. The IPOPCORM project also has an operations research component to test the project’s central hypotheses that food security will be achieved more quickly if reproductive health and coastal resource management interventions are implemented together rather than as single sector strategies.

The actual integration in addressing both environmental and population concerns occurs through four strategic IPOPCORM activities, implemented in each coastal municipality where the project operates. First, the project aims to improve the reproductive health of people living in coastal communities by providing them with information on human sexuality and reproductive health and increasing their access to affordable and readily available reproductive health products. Second, the project encourages and builds the capacity of local communities to manage their own coastal and marine resources through organizing the local community and government officials to support the establishment of marine protected areas (MPAs) while at the same time running an accompanying advocacy and information campaign to educate community members on the importance of their coastal resources. The third activity is an economic development program that introduces alternative livelihoods and micro-credit to coastal dwellers, particularly fishermen, relieving fishing pressure and reducing food security risks. Finally, all these grassroots activities are tied together with a targeted education and advocacy campaign to increase the public and policymakers’ awareness of population-environment links and solutions. The integration of these four activities mainly occurs by targeting three specific groups in critical coastal habitats: fisherfolk, youth, and small-scale entrepreneurs such as sari-sari (village vendors).

This paper presents the theory behind the IPOPCORM project design, its operations research component, and preliminary findings related to implementing integrated reproductive health and coastal resource management activities in project sites. The discussion demonstrates
An integrated approach to project site selection

The IPOPCORM project operates in 18 coastal municipalities and 105 barangays, the lowest unit of local governance in the Philippines. Project sites are located within critical marine corridors identified by the Philippines Department of Environment and Natural Resources (DENR) as “extremely high priority” areas for conservation of marine biodiversity (Perry Ong et. al. 2003). In order to make the largest demographic impact, the IPOPCORM project targets areas with high fisheries and biodiversity value, relatively intact ecosystems and high rates of population growth and momentum. According to demographers, population momentum will account for 65% of the country’s foreseeable growth while unwanted fertility -- which occurs when couples have more children than they want — will be responsible for another 16 percent of future population growth in the Philippines (Population Council, 1996). Four biogeographic zones match these criteria – the Calamianes region, Palawan, Eastern Visayas and Mindanao.

In order to determine the demographic and socioeconomic profile of focal areas, the project conducted a baseline survey of 2,400 households systematically drawn and randomly sampled from 48 study barangays (villages) in 6 coastal municipalities (Cabigon and Raymundo, 2003). The profile demonstrates the subsistence nature of the rural coastal communities, their dependence upon marine resources for food and livelihood, and their lack of reproductive health services and products. The average coastal household contains 6 members, above the national average of 5, and the average daily per capita income is 36 pesos (US$0.72), which is below the country’s poverty threshold (39 pesos) for a household with six persons (Montebon:2004). Most households rely on fishing and seaweed farming for their livelihood; few have alternative income sources due to limited access to credit and markets. Two-thirds of household members are unemployed and those who do work are
primarily employed in marine-based jobs – namely fishing and seaweed farming. One-third of household members are full-time fishers with the proportion ranging as high as 56% in some study areas, reflecting a very high level of dependency on fishing in those communities. Fishers, whose average daily income share is only 20 pesos, are the most impoverished of the coastal dwellers (Montebon:2004). Females comprise about 20 percent of fishers with larger proportions engaged in gleaning (collection of shells, crabs, etc), seaweed farming, and extraction of other coastal resources. Over one-fifth of the households surveyed cannot meet their daily needs and 35% perceive that their standard of living has stagnated or deteriorated over the past 5 years (Cabigon 2003).

Population indicators in the survey area indicate that fertility and teen pregnancy rates are high, and in-migration is increasing. Women in the survey areas experience 3.4 births, on average, which is nearly two times the national figure. The low level of contraceptive use partly explains why fertility is so high in the coastal zone. Only 17% of women of reproductive age currently use modern family planning methods as compared to 33% for the country as a whole. The proportion of women who experience unmet demand for family planning services ranges from 35-65%, nearly 2 times the national figure. However, this is only one part of the picture. Even if fertility plummeted today to replacement level (2.1 children per couple), the coastal population will continue to expand because of the large number of youth about to enter the reproductive age group. In the study areas, 82% of youth age 15-24 are single and 28% are sexually active although few said they used any method to prevent pregnancy at last sexual encounter (5% female; 9% male). 72% of youth have some high school or college education and among those who are not studying, unemployment is high (36%). Teen pregnancy rates are also high in rural coastal areas, in this study 50% of single youth experienced an unplanned or unintended pregnancy and 27% of married youth reported the same. Since most of the coastal areas surveyed are rural, there exists a strong religious and cultural barrier to discussing and practicing family planning, which has contributed to the low contraceptive prevalence rate (Cabigon 2003).

At the same time, household food security is declining due to collapse of municipal fisheries and degradation of related coastal habitats. Study participants recognize the correlation
between overpopulation and depletion of natural resources and are concerned that their communities may soon face a crisis in fish food security. 70% of households agreed with the statement “sometimes there is not enough food to go around and the families goes hungry” while 83% supported the statement “our barangay may soon face a crisis because there are too many people and not enough fish to go around.” (Cabigon 2003)

Program Strategy and Interventions

IPOPCORM uses a symbiotic strategy to link sectors and focuses on protecting critical habitats and reducing population growth in high-growth marine corridors in order to assure food security from the sea and to improve family welfare. Its purpose is to encourage and support the integration of reproductive health management strategies into fisheries and coastal resource management policies and agendas at national, regional and local levels. The project’s strategy emphasizes implementation through partnerships with local government units (LGUs) and nongovernmental organizations (NGOs) with a focus on community participation and engagement rather than pure service delivery. IPOPCORM’s community based approach to marine resource management strives to empower fishing communities to manage and protect their own coastal areas and slow down their population growth so as to achieve a better balance. To this end, the project establishes and builds the capacity of peoples organizations (fishers, women, youth) and barangay government structures to carry out participatory assessments of their coastal resources, conduct conservation and family planning peer education, establish marine management arrangement such as MPAs, provide surveillance and enforcement activities, and finally provide inputs on the legislation, policies, and services that fit barangay needs. Such planning and advocacy activities are institutionalized through the formulation of annual barangay action plans and budgets for linked family planning and coastal resource management activities that then qualify for funding from the Municipal government, who can play an important role in co-financing and sustaining these integrated activities (Castro 2002). Since 2001, the project has created or strengthened 37 MPAs and assisted 90 barangays in planning, implementing and monitoring IPOPCORM activities that were co-financed by contributions from local partners, valued at US $ 350,000 (PFPI: 2004). As of December 2004, the project
was covering about 250,000 people in 18 coastal municipalities that overlap half of the marine biodiversity hotspots areas in the country.

Local government units (LGUs) at the municipal level are also key project partners in all IPOPCORM sites and play an important role in the sustainability of project activities. IPOPCORM builds links between NGO partners, local community organizations and key policymakers in the LGUs in order to educate them on the importance of their resources, encourage them to identify local health and conservation needs, then translate these needs into policies and activities that the LGUs and communities implement. Key LGU policymakers are tapped to participate in trainings and other events with local communities in order to share experiences and outcomes of linking population and the environment in their areas. IPOPCORM provides LGUs with direct technical assistance to encourage them to promote local regulations to protect critical marine habitats, restrict unsustainable and destructive fishing methods, and integrate reproductive health management into fisheries and coastal management agendas, plans and policies at the municipal level. To this end, six LGUs have developed concrete agendas that integrate family planning and AIDS prevention into their coastal management planning (PFPI 2004).

Finally, the IPOPCORM project takes an innovative approach to incorporating local entrepreneurs into project activities to reduce fishing pressure and encourage community distribution of family planning products. In each project site, NGO partners offer technical assistance and micro credit to enterprising coastal resource users for the establishment of new or alternative sources of income. Since project inception, 2,793 coastal dwellers have initiated small businesses that supplement their family’s fishing income, many of them small-scale retail outlets or seaweed farms. In addition, the project has been able to increase access to family planning commodities in rural and hard to reach coastal areas by involving small-scale shop-keepers, locally known as sari-sari store owners, in the social marketing of family planning products at a very local level. As a result, a rural network of 914 community based distribution (CBD) points now exists for contraceptive social marketing increasing access to family planning by ten-fold in project catchment areas. (PFPI, 2004).
IPOPCORM Operations Research Design

IPOPCORM is using a quasi-experimental evaluation design to test the hypothesis that food security will be achieved more quickly when marine resource management and reproductive health management are implemented together. The project is premised on the view that there will be a significant improvement in coastal resource management outcomes and family planning outcomes by delivering these services in an integrated fashion rather than delivering each intervention in isolation. In other words, the integrated approach will leverage the aims of both components and generate added value (PFPI 2000).

In order to test this hypothesis, the operations research component of the IPOPCORM project instituted a quasi-experimental evaluation design using baseline and post-project measurement of dependent variables in six project sites. The evaluation partitions the project intervention into three types of sites; sites with the complete integrated reproductive health and coastal management intervention, sites with only reproductive health interventions, and sites with only coastal management interventions. Outcomes from these three sites are then compared to a control site where there are no project interventions. Dependant variables (see Table 1) were measured at each site in two time periods, first during the establishment of baseline population, ecology and socio-economic benchmarks in 2001 and then during the mid project survey in 2004 (PFPI, 2000).

Table 1. Dependant variables for the IPOPCORM operations research evaluation.

<table>
<thead>
<tr>
<th>CRM only Variables</th>
<th>RH only Variables</th>
<th>Integrated variables</th>
</tr>
</thead>
<tbody>
<tr>
<td>Changes in the population level of target species of coral reef fish</td>
<td>Unmet demand for family planning services among WRA (15-49 years)</td>
<td>Percent of respondents who can explain inter-relationship between overpopulation and coastal resource depletion.</td>
</tr>
<tr>
<td>Changes in kilograms of fish catch/unit effort</td>
<td>Contraceptive prevalence for modern methods for WRA (15-49 years)</td>
<td>Number of municipal CRM plans that include RH/FP strategies.</td>
</tr>
<tr>
<td>Percent change in fish abundance and/or live coral coverage and/or seagrass coverage</td>
<td>Percent of WRA (15-49) who had birth in past 12 months</td>
<td>Number of barangay action plans that include linked CRM-RH activities.</td>
</tr>
<tr>
<td>Number and size of existing and/or new MPAs under improved management</td>
<td>Percent of young females (15-24) who had birth in past 12 months</td>
<td>Amount of resources leveraged from local sources for the integrated approach.</td>
</tr>
<tr>
<td>CRM only Variables</td>
<td>RH only Variables</td>
<td>Integrated variables</td>
</tr>
<tr>
<td>--------------------</td>
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</tr>
<tr>
<td>Number of new regulatory measures adopted to improve MPA management</td>
<td>Percent of sexually active youth (15-24 year) who used a condom or other FP method during last sex</td>
<td></td>
</tr>
<tr>
<td>Percent of households with full-time fishers</td>
<td>Percent of youth (15-24 year) who got pregnant/got someone pregnant unintentionally</td>
<td></td>
</tr>
<tr>
<td>Percent who know someone engaged in illegal fishing.</td>
<td>Percent of households with malnourished child under 3 years of age (weight-age).</td>
<td></td>
</tr>
</tbody>
</table>

**Operations Research and Program Monitoring Trends**

Trends observed in operations research and program monitoring data suggest greater impact on food security in the experimental site where the integrated approach is being implemented compared to sites where single-sector strategies are applied for comparative purpose. Malnutrition (weight-for-age) among preschool children (under age three), for example, declined more rapidly in the integrated site compared to non-integrated and control sites (Amarillo: 2005). This result is consistent with program monitoring trends observed during 2002-2004 in the same sites where fewer respondents report their families “sometimes lack for food” in the integrated site (Montebon: 2005).

IPOPCORM’s synergistic approach also demonstrated better potential for reducing population momentum as reflected in the following comparative results from the 2001 and 2004 population survey rounds in the operations research sites. Recent fertility, as measured by the proportion of young females (15-24 years) giving birth in the past 12 months, decreased by 3.0 percentage points in the integrated site whereas it increased in both the non-integrated and the control sites. Other data showing an increase in the average age at first pregnancy for female youth in the integrated site support this result (Amarillo: 2005).
Results from ecological surveys conducted in 2001 and 2004 in the same operations research sites (MERF 2004) show several positive changes in the productivity and growth parameters of shallow coastal habitats in the study municipalities survey sites (see Table 2 below). However, more analysis needs to be done to determine whether the integrated approach had better impact than uni-dimensional approaches on biodiversity conservation indicators.

Table 2. Change in productivity and growth parameters of coastal habitats.

<table>
<thead>
<tr>
<th>Parameters</th>
<th>RH-ONLY SITE</th>
<th>CRM-ONLY SITE</th>
<th>INTEGRATED SITE</th>
<th>CONTROL SITE</th>
</tr>
</thead>
<tbody>
<tr>
<td>Live Coral Cover (%)</td>
<td>26% increase</td>
<td>57% increase</td>
<td>38% increase</td>
<td>60% increase</td>
</tr>
<tr>
<td>Reef Fish Biomass (MT/km2)</td>
<td>33% increase</td>
<td>26% decrease</td>
<td>22% increase</td>
<td>38% increase</td>
</tr>
<tr>
<td>Reef Fish Density (ind/500m2)</td>
<td>18% decrease</td>
<td>28% increase</td>
<td>44% increase</td>
<td>44% increase</td>
</tr>
<tr>
<td>Seagrass Biomass (g/m2)</td>
<td>50% increase</td>
<td>33% increase</td>
<td>34% increase</td>
<td>11% decrease</td>
</tr>
<tr>
<td>Mangrove Growth Parameters</td>
<td>Decreased</td>
<td>Increased</td>
<td>Decreased</td>
<td>Increased</td>
</tr>
<tr>
<td>CPUE (line fishing) Kg/day</td>
<td>Remained same</td>
<td>Decreased</td>
<td>Increased</td>
<td>Remained same</td>
</tr>
<tr>
<td>Total # Fishers</td>
<td>Increased</td>
<td>Decreased</td>
<td>Increased</td>
<td>Decreased</td>
</tr>
</tbody>
</table>

**Gender Issues**

Gender refers to the different social roles that women and men play, and the power relations between them. Several interesting gender issues have arisen from the preliminary results of IPPOCORM’s monitoring and evaluation activities, which have important implications for future projects hoping to integrate reproductive health into environmental management or conservation projects. For a variety of reasons, women are not well incorporated into natural resource management activities, particularly coastal resource management (OXFAM, 2003). Labor within a fishing family is often divided along gender lines. Men catch the fish while women are primarily responsible for pre and post fishing activities – mending and maintaining tools and nets, preparing meals for fishing trips, and processing and marketing the fish catch (Tambuyog, 1999). In addition to these activities, women often carry the burden of caring for their families and supplementing family income through
marine resource extractive activities such as gleaning or seaweed farming or other household activities like livestock raising and food vending. However, the male role of fishermen is considered more productive because they harness the resources of the sea to generate value. Women’s roles in fisheries activities are often seen as secondary because they support men’s fishing activities. Yet, research shows that women spend 6 hours a day in fishery-related activities and contribute an average of 40% to total household income (OXFAM, 2003). Women play an important role in supporting their families and supplementing household income, especially during times when income from fishing is not sufficient.

Environmental degradation also affects women disproportionately to men (UNFPA, 1995). An ever-diminishing fish catch forces women to take on more responsibility for supplementing household income and providing for their family’s subsistence needs such as food production, procurement of fuelwood, and water collection. Although women significantly contribute to their family’s income from fisheries and are impacted by the deterioration of their marine environment, the division of labor along gender lines traditionally limits women's ability to participate in coastal resource management and decision-making activities. Women's involvement in the formulation, planning, and execution of environmental policy remains low at all levels, from local positions to national environmental policymaking. For this reason, gender disparities in natural resource management and participation in policy-making must be clearly understood.

By linking reproductive health and environment, the IPOPCORM project has been successful in engaging women to participate in community based coastal resource management activities. IPOPCORM education materials combine messages on family planning, family food security, and marine resource management. Certain project activities specifically target women, empowering them to make decisions about their fertility and reproductive health as well as about their marine environment. Women are active project participants as peer advisors on family planning and reproductive health education, as well as serving as community based distributors of contraceptive products. However, since project activities also include community organizing and coastal resource management,
these same women are more involved in mechanisms to increase their participation in CRM forums and multi-sectoral development committees. For example, in integrated IPOPCORM project sites the proportion of females volunteering to guard a fish sanctuary or mangrove forest has increased (Montebon, 2004). Thus, family planning and reproductive health serve as successful mechanisms for attracting and retaining women in coastal management roles.

The IPOPCORM project has also increased women’s participation in coastal management by targeting the wives, sisters and daughters of fishermen as beneficiaries of the project’s economic development component. This component provides access to credit by extending training opportunities and small-scale loans to traditional users of coastal resources for environmentally friendly enterprise development activities. Fishermen’s wives will take out a small loan from the program in order to engage in activities such as hog raising, seaweed farming, and small retail operations that supplement their family’s income. In many instances, these businesses are so successful they can reduce the family’s dependence on fishing or other marine resource extraction activities. Women become an integral part of the family by providing income and sustenance and they also become better able to assert their rights as a member of the family. Partly due to this phenomenon, women’s average monthly income increased by 60% in sites where the integrated approach is applied, whereas it declined in the non-integrated program sites (Montebon, 2004).

Interestingly enough, the project has also uncovered gender distinctions between males and females in the targeted coastal communities. Although females have comparatively higher level of secondary education in these communities, more females than males are unemployed and living in poverty. Results of the 2001 baseline survey demonstrate that men today fish more than men did in previous generations. This explains, in part, the gender disparity in education attainment observed in these rural coastal communities. Focus group participants dub fishing “the fatal attraction” because boys often drop out of high school to go into fishing with little resistance from parents because their families need the supplementary income. Increasing fishing effort (number of fishers) and the open access regime, which encouraged over-harvesting by commercial fishers, contributed to the rapid decline in Philippine fisheries. Without high school education, young fishermen’s
employment options are limited. These factors may explain why the prevalence of poverty among today’s young male fishers is double that of their adult counterparts (Castro, 2004).

The project has also shown the importance of emphasizing male participation in family planning activities. A unique element of IPOP CORM's reproductive health program is the dissemination of information about male sexuality and reproductive health to the male residents of coastal communities. An important part of this activity is promoting the idea that men should participate fully in decisions and actions about family planning, and not see this solely as a women's responsibility. Men are encouraged to play an active and not a passive role in birth spacing and limiting. Male sexual problems are also covered, including sexual dysfunctional disorders and STD symptoms, topics of considerable interest to these men. The holistic approach IPOP CORM uses has reached men who otherwise might have rejected this information. By emphasizing men’s reproductive health rights and their responsibilities in participating in family planning, the project has been able to demonstrate how men can benefit from better control over their own and their family’s future. This in turn improves contraceptive prevalence, as women are more likely to use family planning methods with the support of their partners. Men are also showing more interest in non-scalpel vasectomy (NSV) and several have availed of services offered under the program. Lastly, the project has facilitated informing youth about sexual and reproductive health and lessening resistance by parents who otherwise might oppose. Initially some parents hesitated to allow their teenage sons and daughters to take part in IPOP CORM activities for fear that it would expose them to sex education. The environmental component, however, made the reproductive health element more acceptable and innocuous. Without the inclusion of environmental education, it would have been far more difficult to conduct reproductive health education sessions with youth – upon which the future of the country and its natural heritage hinge (Herman, 2004).
Conclusions

Preliminary results from the IPOPCORM project demonstrate benefits to integrating reproductive health activities into coastal management projects in the developing world context. First, the integrated strategy lends sustainability to resource management interventions by addressing population dynamics. The baseline survey found that most coastal communities lack knowledge and access to family planning information and products. The IPOPCORM project empowered coastal communities to make decisions about their fertility and household size by providing basic reproductive health and family planning information through peer educators and affordable products through the community based distributors system. Meanwhile, marine environmental education and management activities provide these communities with an acceptable context within which to discuss family planning. IPOPCORM educational materials highlight the importance of small family size in improving family welfare, by using food security as the theme unifying population and environment, and provide a tangible, immediate context within which communities can comprehend and accept family planning. As a result, the coastal management component of the project serves as a catalyst for reproductive health and family planning promotion, understanding and acceptance. This reinforcing synergy is particularly noticeable in circumstances when there are significant cultural and religious barriers to discussing and promoting family planning. The integrated strategy makes the family planning component less of a target of resistance in the predominantly Catholic, morally conservative rural coastal communities. The coastal education component also allows the project to better reach youth in these communities, who are generally secluded from information and discussions about sexuality and family planning. As a result of the IPOPCORM project, youth can access sexual and reproductive health information and avoid unintended pregnancy.

The reproductive health project component allows the project to attract women to coastal management activities, increasing their participation in community management boards and governance structures. Such gender sensitive programming allows women to participate fully in the management of the resources they depend on for livelihood and food. An added
benefit is the project’s focus on involving men in their family’s family planning decisions, empowering them to take responsibility for traditionally female issues such as family size, birth spacing, and reproductive health.

Midproject monitoring results also indicate that IPOP CORM integrated sites generate better impacts on reproductive health and coastal management indicators than single-sector approaches. The integrated approach even demonstrates synergy at the household level with noted improvements in the nutritional status of children under three, fewer respondents saying their families lack food, and an increase in average per capita income - particularly among women and fishers.

As the project faces its final year, challenges still exist. Currently, IPOP CORM is building the foundation for sustainability by encouraging partnerships between local government units and their communities and implementing long-term planning and budgeting processes at both the barangay and municipal level. The lack of long-term political commitment to both family planning and coastal management is another impediment to sustainability and project success. For example, the election of a new Municipal Mayor in one project site resulted in deactivation of a marine protected area and a weakening of political support for family planning education activities in the municipality. A national population policy and a national integrated coastal management policy, which are both under various stages of discussion, would provide an appropriate framework to ensure that both population and coastal resource management are priority areas of interest for coastal policymakers and managers in the Philippines.
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