Access to safe drinking water is a basic human need and essential to public health. Illness and death arising from drinking unsafe water has continuing impact on communities throughout the Pacific.

A recent report Sanitation, Hygiene and Drinking water in Pacific Island countries: Converting Commitment into Action (WHO/SOPAC, 2008), states that every year 2800 deaths in Pacific island countries (PICs) result from diarrhoea, and most are children under five years of age. These tragic diarrhoeal deaths are preventable as they are often linked to unsafe water, lack of proper sanitation facilities and poor hygienic practices. In 2006, only 46% of people in PICs had access to any type of improved drinking water facility.

Effective preventive management through a framework for Drinking Water Safety Planning (DWSP) is an efficient mechanism for ensuring the safe quality of drinking water. Drinking water safety planning is a comprehensive risk assessment approach that encompasses all aspects of a drinking water supply, from catchment to consumer, to consistently ensure the safety of drinking water supplies.

Stages in the Drinking Water Safety Planning Process

1. Assemble the DWSP Team
2. Describe the Water Supply
3. Identify Hazards & Prioritize Action
4. Identify Corrective Actions & Develop Improvement Schedules
5. Develop Monitoring Schedule
6. Improve Processes that Support Drinking Water Safety
7. Verify the Drinking Water Safety Team
8. Review the Drinking Water Safety Plan
9. STAGE 1: National Strategy
   - Set Health-based Targets
10. STAGE 2: DWSP developed for Individual Supplies
11. STAGE 3: Independent Surveillance
    - Approval & Audit
12. STAGE 4: Revision impact of DWSP
    - Progress against health based Target

Proportion of people using different types of drinking-water sources in PICs, 2006

Piped to the household 13%
Other improved 32%
Unimproved 54%

Incidence of Death due to Diarrhoea cases per 1000 Population:
- Australia, New Zealand (average): 289
- Pacific Island countries: 671
- World: 725
The Pacific DWSP programme, supported by the Australian government, commenced in late 2005. It is being implemented by SOPAC and WHO, with ‘in-kind’ technical support from the New Zealand Ministry of Health.

The DWSP programme is providing support to participating countries to build their capacity in developing system-specific drinking water safety plans and implement subsequent improvement schedules which will increase the safety of drinking water supplies.
Overview of Progress

The table below demonstrates the varying stages of DWSP within the Pacific.

<table>
<thead>
<tr>
<th>Drinking Water Safety Planning</th>
<th>Countries</th>
</tr>
</thead>
<tbody>
<tr>
<td>Component</td>
<td>CI FSM</td>
</tr>
<tr>
<td>DWSP team in-country</td>
<td>X</td>
</tr>
<tr>
<td>Water supply system description</td>
<td>X</td>
</tr>
<tr>
<td>Hazard identification and prioritization</td>
<td>X</td>
</tr>
<tr>
<td>Improvement schedule</td>
<td>X</td>
</tr>
<tr>
<td>Monitoring schedule</td>
<td>X</td>
</tr>
<tr>
<td>Improve processes that support DWSP</td>
<td>X</td>
</tr>
<tr>
<td>Using the DWSP</td>
<td>X</td>
</tr>
<tr>
<td>DWSP review</td>
<td>X</td>
</tr>
</tbody>
</table>

KEY: To be developed Completed Underway or ongoing

Lessons Learned

A Pacific Lessons Learned workshop was organised on the 3rd August to allow participating countries to share their experiences and respective outcomes from implementing the DWSP approach in selected urban and rural water supply systems. The day also provided a forum to gauge the interest of 'new' countries to adopt the DWSP risk management framework, as it was dovetailed to the Pacific Water and Wastes Association (PWWA) Annual Conference.

The following key lessons learned came out of the workshop.

1. Drinking water safety planning process would work more efficiently if it has champions and stakeholders committed to a common goal such as striving for better health of people
2. Stakeholder collaboration is very beneficial but at the same time can become challenging if there is conflict of interests on the end goal
3. Water resources protection and its management is very important in Pacific island countries
4. Water users will pay for safe drinking water
5. Improvements in water supply takes time
6. Mechanisms should be established to better support community water supply and rural water supply
7. Linking water safety planning to other ongoing in-country water initiatives is valuable
8. All operations staff and those involved in the provision of safe water supply need to be thoroughly involved in drinking water safety planning
9. The timeframe for capacity building and knowledge/skills transfer should be recognised and realistic
Keeping your drinking water safe Community Toolkit contains:

- A Community Toolkit
- Behavior and actions to ensure safe and lasting drinking water supplies.
- Resources with others for the benefit of the physical, mental, and social well-being and not merely the absence of disease or infirmity.

**Programmes**

- Drinking Water Safety Planning in the Pacific is being supported by Australia and New Zealand
- Quality Monitoring Programme
- Keeping Your Drinking Water Safe - Resources
- Water Demand Management Programme
- Converting Commitment to Action - Access to water and Sanitation report

**Organizations**

- World Health Organization (WHO) is the directing and coordinating authority for health within the United Nations system. It is responsible for providing trend analyses of partners from all sectors of society. WHO is involved in a host of closely related public health issues on all fronts - medical, technical, socio-economic, cultural, legal and political - towards the achievement of WHO's global health mission which is to support all countries and the Constitution as "a state of complete physical, mental and social well-being and not merely the absence of disease or infirmity."
- WOGEF (The Water, Oceans and Great Lakes Education Foundation)
- SO PAC (South Pacific Applied Geoscience Commission)
- Pacific Islands Applied Geoscience Commission
- American Samoa (Associate)
- Cook Islands, Federated States of Micronesia, Fiji Islands, French Polynesia (Associate), Guam, Kiribati, Marshall Islands, Nauru, New Caledonia (Associate), New Zealand, Niue, Palau

**Website**

- [www.pacificwater.org](http://www.pacificwater.org)
- [www.wpro.who.int/southpacific](http://www.wpro.who.int/southpacific)

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