

Report on the Pacific Geospatial and Surveying Council Meeting

and

GIS / RS User Conference – Suva Fiji, 16-20 November 2015



PGSC 2014 - Photo courtesy of SPC

Pacific Geospatial and Surveying Council Meeting

The 2nd Pacific Geospatial and Surveying Council (PGSC) meeting was held on the 19 – 20 November 2015 at the Pacifika Conference Room, Lotus Building of the Secretariat of the Pacific Community (SPC) in Nubua, Suva. The Australian Government's Climate and Oceans Support Program in the Pacific (COSPAc) invited Rob Sarib to represent FIG and to participate in discussions by contributing to the development of a "strategy document" for the PGSC. Mr Sarib was also asked to facilitate workshop sessions with representatives from the United Nations Global Geospatial Information Management (UN GGIM) - Dr John Dawson (also from Geoscience Australia), and SPC Geoscience Division officers and Mr Jens Kruger, and Ms Molly Powers-Tora.

At the first meeting of the PGSC in November 2014, Pacific Island surveyors, hydrographers and geospatial scientists established the PGSC and developed a Charter in response to the FIG Small Islands Developing States (SIDs) Suva Statement on Spatially Responsible Governance. The PGSC Charter was formulated to recognise regional challenges and the opportunities to improve capacity building, knowledge and data sharing, and the appreciation and enhancement of co-operation for responsible governance of tenure of land, fisheries and forest, of geospatial (and survey) infrastructure and information management.

To date, 11 of the 14 participating countries have endorsed the PGSC Charter and it is expected the remaining 3 will follow in the next 6 months. It has to be mentioned that the adoption of the United Nations (UN) resolution, initiated by the Republic of Fiji, on Global Geodetic Reference Frame for Sustainable Development at the UN General Assembly on 26 February 2015, may have provided the much needed political will and momentum for this regional action.

The PGSC regional strategic planning workshop was opened with insightful messages from Mr Faatasi Malologa (PGSC interim Chair), Mr. Dawson, Mr. Sarib and Dr. Kifle Kahsai (Chief Geoscientist at SPC). The main component of the workshop discussion was skilfully conducted in an “appreciative and participatory” manner by Ms. Powers-Tora. This style of engagement set an informal, open, friendly and non-apprehensive atmosphere, and was appropriate for the Pacific community. As a consequence, this environment allowed each delegate to actively and freely espouse their experiences, knowledge and ideas. The questions posed to the PGSC members were as follows –

- What has worked well in support of geospatial information, infrastructure and capacity building across the region and why?
- What resources have we got?
- What is your vision for the future of the PGSC?
- What are the steps to achieve that vision?
- How will we know if the PGSC is successful?
- As we are going along, how will we know if the PGSC is operating well?
- At the end of 5 years, how will we know if the PGSC has been effective?
- What are the sources of advice, networks etc can we call on to contribute to the development of the PGSC



PGSC members work shopping the strategic plan

Responses from the PGSC members were then analysed and grouped which resulted in the following preliminary strategic goals being endorsed by the PGSC –

Strategic Goal 1

- *The PGSC provides regional leadership, direction and supports members to engage stakeholders and the community on geospatial and surveying activities.*

Strategic Goal 2

- *The region adopts a modern Geodetic Reference Frame that underpins fundamental geospatial systems and applications.*

Strategic Goal 3

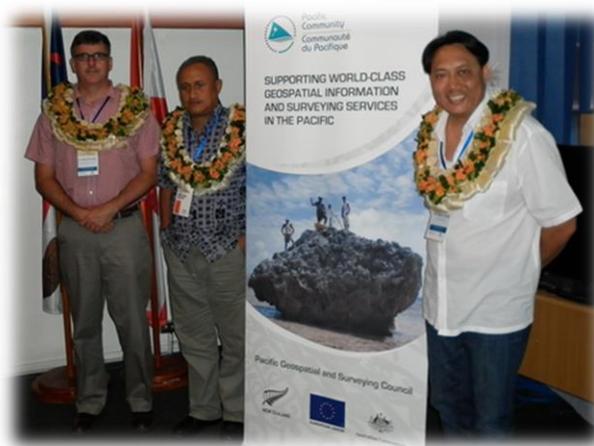
- *Geospatial and surveying activities are supported by a diverse and sustainable resource base.*

Strategic Goal 4

- *The geospatial and surveying community is self-reliant with a culture of learning, innovation and gender equity.*

There were several subsequent sessions on the development of 4-6 strategic actions for each strategic goal, and on the format or structure of the strategy plan document. Due to time constraints, the PGSC had to form several sub-working groups to finalise the strategic actions, and a strategic plan working group was created to oversee and prepare a draft strategy document. Mr. Dawson, Mr. Sarib, Mr. Kruger and Ms. Powers-Tora were assigned to be advisors and reviewers to this process. It is anticipated that a draft strategic plan will be ready for review at the Christchurch FIG WW in May 2015.

The PGSC meeting concluded with the election of office bearers. Both the interim Chair Mr. Faatasi Malologa (Tuvalu) and Vice Chair Mr Paserio Samisoni (Fiji) were re-elected as the permanent occupants for 2016.



From left to right – Dr. John Dawson, PGSC Chair Mr. Faatasi Malologa, Mr. Rob Sarib

From an FIG perspective the work done by the PGSC needs to be applauded as the effort, the desire to succeed and the political will is evident. The PGSC through the development of their strategy plan are aligned with the FIG vision, and acknowledge the present FIG Council's theme and work-plan objectives to contribute to the global sustainable development agenda, building the capacity of surveyors for change, and

the importance of regional collaboration. It was also apparent that PGSC members are very much aware of the need for regional surveyors to measure, monitor and analyse the tangible or real effects of climate change on achieving sustainable development. For example one of the strategic actions discussed was for the Pacific community to recognise the present and future contribution of surveyors to manage the social, economic, environmental and technological challenges caused by sea level rise in the region.

Considering the above, FIG in this region is a well-respected non-government based organisation, who has a role and responsibility for advocating the need for professional surveyors and geospatial scientists. To maintain and improve this profile FIG will need to actively support the Pacific Island Countries and Territories. To fulfil this responsibility the FIG Council and all FIG Commissions should explore the opportunity to convene future technical workshops or seminars or participant in relevant events to address the challenges specific to this region. Initial discussions on such matters should be directed to the PGSC or the FIG member association Fiji Institution of Surveyors.

The work completed by the PGSC to date on the development of the strategy document and related activities has been exceptional. The PGSC members have ownership of their destiny, and realise there are challenges which need to be considered, managed, and resolved. For example -

- Developing timely and effective regional work plans to manage technological, economic, market, societal changes; and how surveyors operate and govern / administer these changes.
- Managing increased emphasis and expectations (from users and stakeholders) on location intelligence and land / geo-information for decision making in sectors such as building, housing and construction, the agricultural segment, land and marine management, mining, environmental management, and response to disasters / climate change.
- Developing land administration and geo-information systems, and geospatial (geodetic) infrastructures that
 - Secures land (and marine) tenure – definition and registration of property rights / interests and supports property market activity or development.
 - Are modern but fit for purpose
 - Comprise of fundamental datasets that are authoritative, accessible, reliable (integrity), accurate, interoperable, can be integrated, and are relevant.
 - Complies with recognised standards, protocols and approaches.
- Identifying and prioritising the requirements to build the overall capacity of surveyors, and to create more opportunities for gender equity. This includes the needs of now versus the future.

- Working innovatively, collaboratively, and in a unified manner in an environment of competing resources and agendas with various sectors and stakeholders – government, academic, commercial and user.
- Identifying and understanding regional and “global aid” programs that are initiated by agencies such as - Aus Aid, NZ Aid, US Aid, World Bank, Asian Development Bank, International Finance Corporation.
- Building a PGSC institutional framework and work plans to attract “aid” at a regional level.
- Building strategic alliances with existing regional organisations in the Pacific who are experienced in the acquisition of resource such as - Pacific Islands Forum, SPC, University of South Pacific (USP), Forum Fisheries Agency (FFA), CROP Agencies, Secretariat of the Pacific Regional Environment Programme (SPREP).
- Identifying and securing resources and developing “people” to operate and administer the PGSC in the future.
- Maintaining PGSC momentum and the will to make a difference.
- Continually promoting the PGSC profile and the advocacy role in region.

Final notes –

- Special thanks to the PGSC Partnership desk for their administrative work and efforts at this meeting.
- Thanks to Mr. Kruger, Ms Powers-Tora and Mr. Andrick Lal (SPC) for being excellent facilitators and hosts.
- Thanks to the PGSC members for their hard work and drive to succeed.
- PGSC website - <http://gsd.spc.int/pgsc/>
- Media coverage of the meeting, refer to website.

Fiji Times: <http://www.fijitimes.com/story.aspx?id=330128>

Pacnews:

<http://www.pina.com.fj/?p=pacnews&m=read&o=918523424564d1524d8b720e63952f>



Images of Suva

GIS / RS User Conference



The Geographic Information Systems (GIS) and Remote Sensing (RS) User Conference was again held at the Japan ICT Centre, University of the South Pacific (USP). This unique symposium has been running since 1999, and was jointly sponsored by USP, SPC Geoscience Division, the Fiji Lands Department and numerous commercial or government based organisations or practitioners operating in the region. The theme for conference was “Bridging the Gaps by Creating Smarter Maps”. Refer to website - <http://gsd.spc.int/gisconference/>

The conference attracted over 300 delegates from 20 plus countries. Participants viewed and listened to over 80 presentations, attended several technical workshops and enjoyed several tropical evening functions. The conference convenors provided an event that delivered knowledge, and enabled professionals and stakeholders to engage, network, and contribute to the dissemination of regional geo-information, applications and capacity development.

From a holistic perspective, the underlying theme for this event seemed to focus on environmental management and the related professional / technical activities of surveyors. Overall there were many overview or status presentations from the government, private and academic sectors that related to technical issues and applications from GIS, RS, geoscience, survey and hydrographic community. It was apparent remote sensing or satellite based data and imagery was a major data source to perform research, science, data / information management and analysis in mainstream GISs.

The main observations to note where –

- The extensive use of LiDAR, UAV technology and satellite imagery / sensors such as Sentinel, World View.
- Several interesting technical papers on response to disasters (such as Cyclone Pam that struck Vanuatu), and the allocation of tasks, facilities and personnel.
- The use of GIS (primarily ERDAS Imagine and ARCGIS) and data sources to analysis information and manage resources for administration of coastlines, protection zones, fishing areas, coconut plantations, de-forestation and bio-security initiatives.

- The need for integrated land information and administration systems that can allow data sharing, assemble and interrogate other datasets that are not directly related to the subject project.
- The need for land and marine legislation to be updated or created that mandates the importance or management of survey, geospatial, land, marine information (that is acts, regulations, and policies)
- Fiji and Tonga are moving towards the adoption and implementation of a new geodetic datum that is ITRF based.
- The status of Solomon Island's upgrade to their hydrographic and survey information management system.
- Vanuatu's progress on developing their land information system and management of government leases.
- Several Pacific countries have finalised their maritime boundaries and lodged these declarations with the UN.
- The development of data portals such as PACGEO, and EPOG for GIS tools.
- The need for one geodetic reference frame and vertical reference surface for the Pacific region.
- The use of open source GIS related tools to manage information such as OPEN FORIS, Q GIS.
- The efforts and interesting ways that many Pacific development partners are implementing to build the capacity of the geospatial and surveying community.
- The need to reinforce the purpose of standards, preferred practices and protocols with respect to geo-information.

In concluding, the GIS / RS User Conferences have emerged as a significant surveying event in the Pacific. It could be said that the FIG Pacific South Island Development Symposium (SIDS) - Policies and Practices for Responsible Governance in September 2013, has assisted with the growing awareness of surveying in the region. Nevertheless the substantial recent activity and reference to the observations mentioned above can only highlight the potential opportunities and need for FIG and its member associations to establish an outreach program for the ongoing development of the professional surveyor in this region.



From left to right – Mr .Rob Sarib, Mr. Bart Thomas, Dr. John Dawson and Mr. Steven Ackerly