

Report on Proposed 2017 UAS Projects

Pursuant to Section 108(2) of the National Information and Communications Technology Act
2009

From the UAS Board to the Minister

18 May 2017

1. Introduction

NICTA has provided to the UAS Board, and the UAS Board has considered, NICTA's Report prepared under Section 108 (1) of the **National Information and Communications Technology Act 2009** (the 'Act').

Section 108(1) provides for NICTA to undertake the following tasks:

- a) *identify, develop and estimate the indicative cost of UAS Projects; and*
- b) *receive from stakeholders' submissions on proposals for UAS Projects; and*
- c) *undertake public consultation, if NICTA considers it necessary or desirable, to identify UAS Projects and their indicative costing; and*
- d) *estimate the proposed aggregate budget for all UAS Projects to be undertaken under this Part for the relevant period identified by the UAS Board; and*
- e) *rank the UAS Projects identified and developed under Subsections (1)(a) or (b) in order of priority with regard to –*
 - i) *their affordability within the proposed budget; and*
 - ii) *the remaining factors listed in Subsection (4); and*
- f) *prepare for consideration by the UAS Board, a report which summarises the UAS Projects under consideration, their respective indicative costing, their proposed ranking (and the reasons for their ranking), and the proposed aggregate budget, as identified above.*

Sections 108(2) and 108(3) of the Act provide for the UAS Board to consider the above Report of NICTA and prepare a Report for submission to the Minister concerning recommended UAS Projects, and in particular states:

(2) The UAS Board shall consider the report prepared by NICTA under Subsection (1) and prepare a UAS Project report which identifies the UAS Board's recommendations for UAS Projects, their ranking and the reason for such ranking.

(3) The UAS Board shall submit the UAS Project report (as prepared under Subsection (2)), to the Minister, at least once in every calendar year, for the Minister's consideration.

Section 108(4) of the Act also sets out the following requirements for consideration by the UAS Board of proposed UAS Projects, for the purpose of the UAS Board's Report to the Minister:

(4) In assessing the ranking of UAS Projects, NICTA and the UAS Board shall have regard to the following factors-

- (a) whether the proposed UAS Project would promote the objectives of the Universal Access and Service Fund; and
- (b) the net benefits of the UAS Project to Papua New Guinea, taking into account any costs and detriments to any person; and
- (c) whether the UAS Project is sustainable with a one-time capital subsidy; and
- (d) whether the UAS Project would not otherwise occur but for a subsidy payment under this Part; and

(e) the likely efficiency and effectiveness of the proposed UAS Project and whether it is financially and technically feasible; and
if) any other information the UAS Board considers relevant; and

shall ensure that –

(g) any UAS Project does not include services under a mandatory coverage obligation;
and
(h) any UAS Project is not otherwise provided by a pre-existing UAS Project.

The UAS Board has considered the NICTA Report and had regard to the above matters pursuant to the Act, and on that basis has prepared this Report to the Minister under Section 108(2) of the Act.

This Report also has been prepared with due regard for
Section 90 (1) of the Act, which states:

The objective of the Universal Access and Service Fund is to promote the long-term economic and social development of Papua New Guinea by funding approved UAS Projects that will encourage the development of ICT infrastructure and improve the availability of ICT services within Papua New Guinea, including in rural communities.”

As described further below, the UAS Board has decided to recommend to the Minister three projects for 2017 are described further below.

The UAS Board notes that, among other things, these three projects promote the objective of Section 90 (1) by:

- i) Facilitating an enabling environment for ICT;
- ii) Promoting Universal Access and Universal Service;
- iii) Promoting Universal Coverage; and
- iv) Facilitating connectivity for development.

The UAS Board also notes that these three projects are consistent with and promote the following objectives:

- Co-location and infrastructure sharing: Projects should where feasible involve infrastructure sharing by service providers at reasonable prices to prevent or reduce UAS funds being used to create local monopolies.
- Social inclusion: UAS projects should enable equitable access to ICT services by vulnerable groups and disadvantaged interests, that is, the elderly, physically challenged, women and children in the community.
- Geographic coverage: UAS programs and projects should be developed for provinces and wards to target un-served and underserved areas and communities.
- Promote private sector investment: UAS programs and projects should seek, where feasible and consistent with UAS requirements, to stimulate increased private sector investment in un-served and underserved areas.

- Encourage competition: UAS programs and projects should seek, where feasible and consistent with UAS requirements, to encourage competition between operators, and use transparent and competitive mechanisms to allocate UAS financing and subsidies.
- Promote consumer interest: UAS programs and projects should seek, where feasible and consistent with UAS requirements, to promote consumer interest by facilitating access to affordable, readily available and reliable ICT services.
- Sustainability: the UAS plan will give priority to programs and projects that are self-sustaining, or sustaining with a one-off capital subsidy, and do not require subsidies on a continuous basis.
- Foster economic and social development: UAS programs and projects will stimulate productive use of ICTs for economic, social and cultural development.
- Quality of service: UAS Projects should comply fully with quality of service standards.
- Technology neutrality: UAS programs and projects should not be biased in favour of a given technology or technologies and instead will utilise the most suitable technology or mix of technologies for each project or groups of projects.

2. Proposed Project: Voice Connectivity

The project was commenced under World Bank funding in 2014. The UAS Board proposes that the Project be extended into 2017. The Project also is of such a nature that it may be appropriate to continue after 2017, although at this stage no decision needs to be made beyond 2017.

This Project is directed to unserved or unconnected areas or communities. The benefits of the Project will be to provide affordable telecom services particularly for low income users and potential users in rural and remote areas of PNG. The communities involved will be able to engage in the social, economic and cultural development of the nation to a much larger extent than currently. In addition, they will have better access to information and services such as health, education, security and public services generally.

There are a large number of unserved and unconnected areas and communities in PNG. The Universal Access Board has identified, as shown in Attachment A, a list of 12 such communities or areas with higher average capital cost per person of providing connectivity, has ranked those projects, and proposes that a minimum of 10 of these 12 projects be implemented for 2017. The costs have been taken from the average costs that have been recently bid for specific projects in the earlier part of this program in 2014 and have been adjusted using updated information. It should be noted that this list is not exhaustive.

The average capital cost per site is estimated to be PGK600, 000 for the minimum of 10 sites to be implemented in 2017. Accordingly, the 2017 budget for this proposed project is PGK 6.0 million.

3. Proposed Project: Accelerated Mobile Phone Expansion and Upgrades

This Project is aimed at upgrading base stations from 2G (effectively voice and limited data) to 3G or 4G in areas where, but for UAS funding, this would not happen on a commercial basis.

The budget of PGK 2 million is based on upgrading 40 sites at an average capital cost of PGK 50,000. A single contract is proposed to be offered, with specific sites negotiated at the time. The costs have been taken from the average costs that have been recently bid for specific projects in the earlier part of this program in 2016.

The benefits of these upgrades will be to enable customers in the service areas to better engage in the economy and with government services through internet access.

4. Proposed Project: Connect the Schools

This Project aims to provide internet connectivity and broadband services to all primary, secondary and tertiary institutions in the country that currently do not have such access and are not planned to have such access during the period of the project.

The Project is expected to be undertaken with the active partnership of the Department of Education whose main role will be to ensure that the educational outcomes of the project are maximized.

The Project involves providing internet access, and the provision at each school of a computer laboratory equipped with PCs and printers.

In consultation with the Department of Education, a total of five (5) schools around the country have been initially selected to benefit from this project.

The UAS Board expects an average cost of PGK200, 000 per site over a period of two (2) years. A list of the schools can be found in Attachment B.

The costs have been taken from the average costs that have been recently tendered for specific projects in the earlier part of this program in 2017.

5. Project Ranking

The UAS Board proposes that each of the above UAS Projects be implemented in 2017, as each of these projects make strong and effective contributions to the UAS objectives in somewhat different and complimentary ways.

The UAS Board also has ranked these three (3) Projects, having regard to the matters referred to in Sections 108 (1) (e) and 108 (4) of the Act. The results of this ranking are that the 'Voice Connectivity' Project is ranked first; the 'Accelerated Mobile Phone Expansion and Upgrade Project is ranked second; and the 'Connect the Schools' Project is ranked third.

The matters considered by the UAS Board in making this ranking include that the first ranking project delivers services to a significant number of unconnected and unserved areas in a highly affordable manner, whereas the latter two projects are more focused on enhancing key services to under-served customers.

6. Estimated Total Budget required for Projects in the remainder of 2017

In identifying the proposed scope and budget for the above projects, the UAS Board has taken into consideration that only part of the 2017 year remains for project implementation, and has based its budget on the amount of implementation that appears to be possible during the remainder of 2017.

In summary, the cost of the Projects recommended for the remainder of 2017 is PGK 10. million made up of:

Project	PGK (million)
Voice Connectivity	6.0

Accelerated Mobile Phone Expansion and Upgrade	2
Connect the Schools	2
Grand Total	10.0

Project implementation will be subject to availability of funds. In this respect, NICTA has advised operators recently that NICTA will issue, for comment, a proposed decision regarding a UAS Levy for 2017. If the above project budget were to come solely from such a levy, it likely would represent a levy of less than 1% of eligible operator revenue, as compared with a maximum levy amount in NICTA's Regulations of 2%. The UAS Board also notes that no operator levies have been paid since January 2011, when Section 107 of the Act allows NICTA to begin requiring such levies to be paid.

7. Conclusion

The UAS Board respectfully submits this Report for the approval of the Minister, pursuant to Section 108(3) of the NICT Act, and respectfully requests a prompt approval of these proposed projects, so that UA services can commence to be delivered to needy locations and communities.

Attachment A: List of Communities under the Voice Connectivity Project

No.	Province	District/Area	LLG	Census Units	Population Served
1	Central	Goilala	Guari Rural	18	2035
2	Northern	Sohe	Higaturu Rural	16	2066
3	Morobe	Nawae	Nabak Rural	23	5190
4	West Sepik	Aitape/Lumi	West Wapei Rural	10	2224
5	West New Britain	Kandrian/Gloucester	Kandrian Inland Rural	15	2428
6	East Sepik	Ambunti/Drekikir	Tunao Hustin Rural	19	2749
7	Western Highlands	Dei	Dei Rural	15	2750
8	Chimbu	Karimui/Nomane	Karimui Rural	11	3016
9	East New Britain	Pomio	West Pomio/Mamusi Rural	20	3530
10	Madang	Middle Ramu	Josephstaal Rural	16	3638
11	Southern Highlands	Kagua Erave	Erave Rural	25	4627
12	East New Britain	Pomio	Central Inland Pomio	24	4257

Attachment B List of Schools

No	School	Province	District	Student Population
1	Maprik Secondary School	East Sepik	Maprik	935
2	Kwikila Secondary School	Central	Rigo	792
3	Buin Secondary School	AROB	South Bougainville	753
4	Holy Name Secondary School	Milne Bay	Alotau	581
5	Awaba Secondary School	Western	Middle fly	414