

20121004 SLAC UNIMAS meeting

The UNIMAS PingER Wiki
Meeting notes

Attendees

Johari at Unimas and Les & Bebo in the Bay Area. Nara was unable to be present he was in KL.

General

The meeting was by Skype at 11am in Sarawak as usual.

Mohamad is no longer with us, he is concentrating on getting a PhD

UNIMAS have managed to get 1 undergraduate students for their capstone project to use data collected above to perform some analysis/assessment on the end-to-end performance of Internet in SE Asia. This will be a 2 semester project.

Johari plans to get another undergraduate student from the capstone project. The Goal will be to build a PingER web site for UNIMAS

Workshop

- Unimas plan to have a workshop on Pinger when Les comes in December. Unimas will invite participants from universities in West Malaysia, Sabah and Sarawak, (Brunei and Kalimantan could be added). The idea is to establish regional agreement for types of studies that can be undertaken, the sharing of data and exploration of future projects.
- Unimas will send a formal invite to Les to visit Unimas for the order of a week or more to coincide with the Unimas 20 year anniversary celebrations on December 12th, 2012. Johari sent email to VC to get suitable dates. The visit will be 3-4 days. The idea is Les arrives on Wednesday 12th December, the full day workshop is on Thursday 13th, followed by meetings with specific researchers on Friday 14th. The weekend is free. then on Monday 17th there are technical discussions. Bebo suggested that since the flight to Kuching will go through Kuala Lumpur, Les should visit MIMAS and give a talk. Johari will discuss this with Nara.
- Last week Les met with the Muhammad Asghar the Rector of the Pakistan National University of Science and Technology (NUST) and Dr. Arshad Ali the Director General (DG) of the NUST School of Electrical Engineering and Computer Science (SEECS). They were excited to hear of the upcoming roadmap. Arshad visited the University of Malaysia in KL (UM) in October 2011 and the VC of the UM recently visited NUST. Both sides are keen to reach out to one another. As a result of this they (NUST/SEECS) are interested in looking at how to engage a collaboration of NUST/SEECS, UNIMAS and SLAC on PingER. Possible ways to advance would include:
 - Inviting one or two people from NUST/SEECS who have been collaborating on PingER for some years, have set up a PingER archiving site and manage multiple PingER monitors in Pakistan.
 - They could make valuable presentations on hands-on experiences (both technical, political and social) with building the archive site, managing multiple monitoring sites, mining the data, engaging customers (monitor sites contacts and decision makers, the network providers PERN (Pakistan Educational and Research Network), the funding agency (Higher Education Commission), preparing reports for the customers, and the benefits ensuing etc.
 - Putting together a joint proposal (UNIMAS, NUST/SEECS, SLAC, possibly another Malaysian university such as UM) to a funding source for a joint project to set up a monitoring infrastructure for Malaysia educational sites.
 - Arshad is also putting together a letter to the VC of UM.
 - We could set up a 3 way Skype meeting to discuss this further, this time of day works for all sites.
- If NUST funds their people this should be no problem. Otherwise Johari will need to discuss with Nara and engage the VC to see whether UNIMAS can fund them.

Future meetings

There was a council meeting at the end of September. Nara handed out the PingER brochures to the council members. Twelve Universities were at the meeting. They will contact the other universities to provide them with information on the workshop.

UNIMAS PingER host name

Imran has successfully assigned the DNS name pinger.unimas.my to the UNIMAS PingER monitor (49.50.236.98). The Srcname has been updated and the meta database updated at SLAC. All was working for several days, however now the web server is not working, so we can't gather the data.

Extending UNIMAS PingER hosts monitoring

Joun has added around 15 more hosts within Malaysia, Brunei, Indonesia, and Singapore to pinger.xml. Planning to get few more hosts to cover Phillipines, and Vietnam.

The monitoring will provide an historical record of performance (round trip times, jitter, loss), reachability etc. Based on this a case study could be put together to identify problems in particular the reliability (e.g. MTBF, uptime, MTTF), how congested the connection is, identify problems and possibly identify the causes.

When a reasonable amount of data has been gathered then a case study could be made of the connections to the remote sites, to identify and compare the performance.

ePingER

See <https://confluence.slac.stanford.edu/display/IEPM/ePingER+Project>

Unimas are going to propose a project to install ePingER hosts in remote Sarawak communities such as Bario in the Kelabit highlands. Initially these would simply be PingER targets responding to pings. Later depending on bandwidth availability etc. They could also be turned into PingER monitoring hosts and a web site.

They have remote sites in Kelabit Highlands in Barrio. There is a wireless network. the hosts are solar powered. They could install an ePinger host and ping from Unimas via the VSAT connection. Could be a month or two to set the host at Bario up. There are other telecenter sites that are similar. They could also put up hosts in these places. These telecenters include: Long Lamai, and Ba Kalalan.

There is also interest in ePingER, e.g. for other major sites in Malaysia and even the Kelabit highlands where its low power requirements and low cost together with the ability to host applications such as a web accessible PingER monitoring station, could be very advantageous to quantitatively study the network performance, and provide reports for decisions makers and funding agencies on how to improve the network.

An ePingER App for an Android or iOS might also be an interesting project.

UNIMAS want to purchase 2-3 ePingER machines. However they have not found a distributor in Asia yet.

Next meeting

I will away from Oct 19th thru Novemver 3rd visting Nairobi, Kenya for the eGy-Africa meeting. Bebo will be unable to attend.

Thursday 8th November 8pm Pacific Daylight Time, Friday 9th November 11am Malay time.