OFA EWG Meeting – 9/15/2014

Attendees

First	Last	Company	07/21/14	08/04/14	08/18/14	09/15/14
Frankie	Fan	Broadcom				Х
Eddie		Broadcom				Х
Steve	Wise	Chelsio	Х	Х	Х	Х
Pradeep	Kankipati	Emulex	Х	Х	Х	
Pradeep	Satyanarayana	IBM				Х
Phil	Cayton	Intel		Х		
Arlin	Davis	Intel	Х			
Tom	Elken	Intel	Х	Х	Х	Х
Tatyana	Nikolova	Intel	Х	Х	Х	Х
Robert	Woodruff	Intel			Х	Х
Vladimir	Sokolovsky	Mellanox	Х	Х	Х	Х
Jeff	Becker	NASA	Х			Х
Rupert	Dance	Software Forge	Х	Х	Х	Х
John	Jolly	SUSE		Х		

Note: The toll-free number in the United States and Canada is 1-888-875-9370.

Agenda

OFED 3.12-1 status

- OFED 3.12-1-RC1 Released 8/27/2014
 - o https://www.openfabrics.org/downloads/OFED/ofed-3.12-1/OFED-3.12-1-rc1.tgz
- OFED 3.12-1 Daily Build 9/10/2014
 - <u>https://www.openfabrics.org/downloads/OFED/ofed-3.12-1-daily/OFED-3.12-1-20140910-0414.tgz</u>
 - Status of 1.0.19-1 release of librdmacm
- OFED 3.12-1 User Package Status
 - o https://ofa.causewaynow.com/wg/EWG/document/204
 - Maintainers need updates
 - ibpd Jerrie Coffman
 - libibscif Jianxin Xiong
 - Jay Sternberg and Phil Cayton are also involved in the Intel MIC projects

• OFED 3.12-1 Bug Status

- o https://ofa.causewaynow.com/wg/EWG/document/179
- Bug 2475 opened 3/19/2014
- Bugs <u>2489</u> and <u>2490</u> NFSoRDMA
- \circ Bug <u>2492</u> Perfest
- Bug <u>2494</u> NFSoRDMA
- Bug <u>2502</u> RDS
- Intel MIC integration status

OFED 3.12-1

• Next RC Scheduled

OFED 3.17 or 3.18

- next release
- RoCEv2 status

Introduction of new members from Broadcom:

Frankie Fan - Broadcom

He is interested in RDMA in general and specifically IB and RoCE

Eddie Wai - Broadcom

He is from the same organization as Frankie His area of focus is the RoCE Linux Driver

Robert Woodruff (aka Woody) - Co-Chair OFA EWG

- The Enterprise Working Group (EWG) is part of OFA. Its primary mission is to take OpenFabrics Software (OFS) which is developed by the by maintainers and push it upstream into the kernel and then combine the kernel with OFS user packages and build an enterprise ready software package known as OpenFabrics Enterprise Distribution (OFED). We also include backports for various Distros.
- 2) We generally meet for 30+ minutes on a bi-weekly basis
- 3) OFED can also contain experimental features like support for the Xeon Phi. We initially preview experimental things people want to. With Xeon Phi (MIC Build) we did a branch release but it caused fragmentation and some confusion in the community so we pulled it into the base OFED. This feature is optionally built and is not installed by default because there are other dependencies and Intel software required to use this feature.

OFED 3.12-1 Build Issues

- 1) Vlad Infinipath-psm for SLES 12 won't compile. Woody is aware of this see the notes under bug 2475
- 2) Woody should we include support for RHEL 6.6 in OFED 3.12-1?
 - a) We all agreed that it would be good to provide support
 - b) Vlad will add basic backports and other team members will have to do their part.
 - c) He will send notes on any compilations issues.

OFED 3.12-1 Bug Status

- o https://ofa.causewaynow.com/wg/EWG/document/179
 - Bug <u>2475</u> infinipath-psm-3.2-2_ga8c3e3e_open rpmbuild fails on RHEL7.0
 - This was opened 3/19/2014 and the issue is that it needs a new version of PSM. Woody and Tom both feel that this should not hold back the release of RC2. Compile time problem is not big issue. This is related to other parts of the Xeon Phi code they are working on.
 - They need another week or two and the update will provide a new version of PSM and provide support for the True Scale products.
 - All new updates for Xeon Phi have been integrated into RC1
- \circ Bugs <u>2489</u> and <u>2490</u> NFSoRDMA
 - 2489 Should not stop OFED 3.12-1. Steve says this is not regression issue. It is up to Devesh from Emulex to test the fix and verify that it has been resolved.
 - Jeff Becker: I do not have RoCE adapters and so I cannot test the fix.
 - Steve feels there still may be some issues and that this is somewhat a Roland issue. The kernel folks need to review and agree to a solution.
 - Reduce to P2 and Major.
 - AR Need to document in release notes

- o 2490
 - Jeff the patch that Allen (Emulex) submitted (second item) is included in 3.12-1
 - **AR**: Jeff This needs to be tested turn back to Devesh
 - This bug has been re-assigned to Devesh
- \circ Bug <u>2492</u> Perfest
 - Steve Chelsio has a new developer who is working on this. Patch for multiple Q-Pair fix.
 - He will send upstream to the perftest maintainer and ask Gil to check out and accept the patch. This is an application issue and is not critical
- Bug <u>2494</u> NFSoRDMA
 - Pradeep he has evaluated the problems and suggested a solution which is that the server and client must negotiate max size support.
 - There is still another potential issue: there will still be a problem if an errant client sends RPC that exceeds negotiated size.
 - Steve Wise has volunteered to create a patch to resolve the problem. If fix works, it is a one line change. Then we will have to submit it upstream and make sure NFS maintainer are OK
 - After the patch is supplied, AR goes to UNH-IOL to test
- Bug <u>2502</u> RDS
 - Vlad OFED 3.12-1 does not include RDS and therefore if OFED is installed then RDS cannot work with OFED IB-Core. Did not include RDS because there is no maintainer. RDS currently can only work with upstream. This is not a supported configuration for OFA OFED.
 - Pradeep is it still upstream and maintained?
 - Steve RDS for iWARP sure is buggy but does not know about IB or TCP.
 - Steve it is a backport issue. No one to maintain. He did see some commits to it last May.
 - Woody some people want to use RDS in Intel
 - AR: Contact Oracle and see if there is an active maintainer and if they want to include RDS in OFED. If not, then close as not supported under OFED.

Next release for OFED 3.12-1

- 1) Should we ask Vlad to release RC2?
 - a) **Woody** yes as long as we commit to doing RC3 so that we have MIC support for Intel True Scale products. Right now the Xeon Phi works with Mellanox but not True Scale adapters.
 - b) Vlad is good to do RC tomorrow.
- 2) After RC2 we decided we will RC3 and include support for RHEL 6.6 as well.

Future releases of OFED

- 1) The IBTA wanted to know if OFED includes support for RoCEv2
 - a) **Vlad**: RoCEv2 is not upstream yet and has dependencies such as IP based addressing which is not in 3.12
- 2) **Woody**: we should wait for 3.12-1 GA before we decide what version to target next. Then decide what features we want and if they are in 3.17 or 3.18. It makes sense to wait for the features we want and not just produce OFED 3.17 if it does not support the things we need.

ARs

Jeff Becker

9/15/2014

1) Re-assign bug 2490 for Devesh to validate – done 9/15/2014

8/4/2014

1) Work with Pradeep to solve Bug 2494 - Resolved and verified on 9/19/2014

Chelsio – Steve Wise

9/15/2014

- 1) Create a patch to solve the issue in bug $2494 done \frac{9}{12}/2014$
- 2) Send patch upstream once the fix is verified by UNH-IOL
- 3) Send patch for Bug 2492 upstream to the perftest maintainer and ask them to check out and accept the patch

IBM

8/4/2014

1) Work with Jeff Becker and UNH-IOL to solve Bug 2494 before RC1 - Resolved and verified on 9/19/2014

4/28/2014

- 1) Pradeep will try and get another PPC64 for the OFA Cluster at UNH-IOL because it will help with diagnosing issues that seem to be turning up with OFED running on Big Endian machines
 - a) Pradeep confirms that this is in process as of 9/11/2014

2/17/2014

1) Pradeep will try to get Mellanox FW and adapter model to test IB on NFSoRDMA

Intel

8/18/2014

Woody

- 1) Check status on infinipath-psm this is in process as of 9/15/2014
 - a) Suggest that we go ahead with RC1 w/o the new PSM library and then add it in in RC2 in a couple of weeks.
- Get Intel MIC team to do release notes on new Intel MIC functionality built into OFED 3.12-1 done as of 9/16/2014 and OFED 3.12-1 RC2

7/21/2014

1) Tom Elken Get updated infinipath-psm and qib packages by August 15th

Rupert

9/15/2014

- 1) Need to document the issue in Bug 2489 in the release notes for OFED 3.12-1
- Contact Oracle and see if there is an active maintainer and if they want to include RDS in OFED. If not, then close as not supported under OFED. Is Andy Grover still the maintainer for RDS and Bug <u>2502</u>

8/4/2014

1) Rupert ask UNH-IOL to test SLES 12

- a) Sent request to John Jolly for access on 8/14/2014
- b) John Jolly confirms that it is in process as of 9/3/2014

UNH-IOL

9/15/2014

1) Apply patch to bug 2494 and verify that the issue is resolved - Resolved and verified on 9/19/2014