**NIST Big Data Public Working Group (NBD-PWG)**

**NBD-PWD-2016/M0551**

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**Status: Draft**

**Title: Web chat from Meeting of August 9, 2016**

**Chat Log D:\\_wo\1DMG\2015\\_BigDataWG\Docs\ChatLog 2016\_08\_09 15\_19.rtf**

**Wo Chang (to Everyone)**: 1:00 PM: Russell can you hear me?

**Jude Ken-Kwofie (to Everyone)**: 1:04 PM: Thanks..

**Mark Underwood (to Everyone)**: 1:05 PM: Hi Jude Welcome - U can reach me at mark.underwood@kryptonbrothers.com if need be

**Jude Ken-Kwofie (to Everyone)**: 1:06 PM: Nice to meet you Mark.

**Mark Underwood (to Everyone)**: 1:06 PM: Likewise!

**Russell Reinsch (to Organizer(s) Only)**: 1:19 PM: I am going to check out. I will be on Gchat if you want me to check in

**Mark Underwood (to Everyone)**: 1:28 PM: I wonder if "policy" is overloaded here

**Arnab Roy (to Everyone)**: 1:29 PM: Sorry looks I dropped off the call

**Mark Underwood (to Everyone)**: 1:30 PM: My answer to Ann would be that we are addressing that elsewhere in the fabric

**Tim Zimmerlin (to Everyone)**: 1:44 PM: Security and privacy are independent, and are solved independently.

**Tim Zimmerlin (to Everyone)**: 1:44 PM: Security is achieved by successful mechanisms (defenses).

**Tim Zimmerlin (to Everyone)**: 1:45 PM: Privacy is achieved by successful prosecution.

**Tim Zimmerlin (to Everyone)**: 1:46 PM: Rules of evidence require audit logs, watermarks inside datasets.

**Mark Underwood (to Everyone)**: 1:47 PM: +1 Security is just as incremental

**Tim Zimmerlin (to Everyone)**: 1:48 PM: Arnab is offering some security mechanisms.

**Mark Underwood (to Everyone)**: 1:49 PM: primitives

**Ann Racuya-Robbins (to Everyone)**: 1:53 PM: I think some kind of cross walk with privacy would still be helpful. Thank you Arnab. It will show at the very least the kind of thinking that is going on for security and for privacy.

**Mark Underwood (to Everyone)**: 1:53 PM: Arnab: do you think the RA holds up as you worked through this? I wonder about "data provider," for instance

**Arnab Roy (to Everyone)**: 1:56 PM: @Ann: Thanks for your feedback. I will be happy to work with you on this

**Arnab Roy (to Everyone)**: 1:58 PM: @Mark: sometimes I do think that the components are not sharply isolated as per the RA. But I guess thats the best we have now

**Tim Zimmerlin (to Everyone)**: 1:58 PM: Arnab's taxonomy applies to restricted data sharing in federated systems (of systems).

**Mark Underwood (to Everyone)**: 1:59 PM: Wo is suggesting white papers as a means of bridging the Test Bed to the next document version

**Tim Zimmerlin (to Everyone)**: 1:59 PM: ...encryption also provides a barrier for datasets sent outside the security perimeter...as evidence of who could have spilled data.

**Tim Zimmerlin (to Everyone)**: 2:05 PM: Arnab, you have one MAJOR concern with workers who lose their access permissions...they still have their old keys.

**Ann Racuya-Robbins (to Everyone)**: 2:06 PM: Great Mark and Wo!

**Arnab Roy (to Everyone)**: 2:07 PM: @Tim: that is a major concern. You can't hide data that's already spilled. But there are revocation mechanisms which can still give you best possible mechanisms for going forward

**Tim Zimmerlin (to Everyone)**: 2:09 PM: Arnab, that would require both ID and key be used together.

**Arnab Roy (to Everyone)**: 2:09 PM: There's ID based encryption with revocation protocols

**Arnab Roy (to Everyone)**: 2:10 PM: Here's one paper on this primitive: https://eprint.iacr.org/2012/052.pdf

**Tim Zimmerlin (to Everyone)**: 2:11 PM: ...thanks!

**Ann Racuya-Robbins (to Everyone)**: 2:17 PM: those are good suggestions Wo.

**Tim Zimmerlin (to Everyone)**: 2:26 PM: Mark, what you are saying highlights a "SnP as a Service" approach.

**Tim Zimmerlin (to Everyone)**: 2:27 PM: ...maybe you can start with identified SnP services...and later drill down.

**Tim Zimmerlin (to Everyone)**: 2:28 PM: ...federated identity...logging...auditing...

**Mark Underwood (to Everyone)**: 2:28 PM: +1 tim

**Tim Zimmerlin (to Everyone)**: 2:28 PM: ...attribute based access control...role based access control...

**Tim Zimmerlin (to Everyone)**: 2:32 PM: ...breach notification services...

**Tim Zimmerlin (to Everyone)**: 2:38 PM: Mark, SnP as a Service might accelerate US adoption of big data systems, especially for small & medium enterprises.

**Tim Zimmerlin (to Everyone)**: 2:38 PM: ...Amazon AWS already provides SnP as a Service...

**Jude Ken-Kwofie (to Everyone)**: 2:38 PM: Yes AWS does

**Ann Racuya-Robbins (to Everyone)**: 2:44 PM: I think interdependencies is a critical problem for big data and emergent events

**Tim Zimmerlin (to Everyone)**: 2:50 PM: Most big data APis will be REST based.

**Tim Zimmerlin (to Everyone)**: 2:50 PM: Most big data APIs will use ports 80/443.

**Tim Zimmerlin (to Everyone)**: 2:52 PM: The non big data APIs will operate locally on servers, after logging in with ssh.

**Tim Zimmerlin (to Everyone)**: 2:59 PM: Mark, please add "Monitoring as a Service" (e.g., service provider watches all the smart devices in your residence; your car dealer monitors your smart car)

**Ann Racuya-Robbins (to Everyone)**: 2:59 PM: Mark is this doc ready to circulate to snp group?

**Tim Zimmerlin (to Everyone)**: 3:00 PM: Mark, you ignored "federation" services.

**Tim Zimmerlin (to Everyone)**: 3:01 PM: Mark, you gave short shrift to metadata.

**Jude Ken-Kwofie (to Everyone)**: 3:01 PM: Guys, I have to jump off but will be on next call. Thanks

**Mark Underwood (to Everyone)**: 3:02 PM: Yeah, Tim - didn't mean to. Metadata is key. See metadata role in TOSCA

**Tim Zimmerlin (to Everyone)**: 3:03 PM: Mark, you do not identify (list) relevant organizations for SnP...relevant SnP initiatives.

**Tim Zimmerlin (to Everyone)**: 3:03 PM: ...IETF, W3C...

**Tim Zimmerlin (to Everyone)**: 3:04 PM: ...SDN, Linux Foundation, Apache Foundation...

**Tim Zimmerlin (to Everyone)**: 3:06 PM: ...FTC, FCC, NIST, NSF, NIH...

**Ann Racuya-Robbins (to Everyone)**: 3:07 PM: Thank you very much Mark.

**Robert Reyling (to Everyone)**: 3:11 PM: Thanks. Very Informative! Session ending at 3:12?

**Mark Underwood (to Everyone)**: 3:12 PM: Sorry, Robert, we are running over

**Robert Reyling (to Everyone)**: 3:16 PM: It's O.K. there is a good discussion occurring.

**Robert Reyling (to Everyone)**: 3:19 PM: End of Meeting was 3:19 PM EDT