**MOTOROLA** *SOLUTIONS*

DOCUMENT NUMBER:  MTN-0005-20-NA
APC:                          877
ISSUE DATE:          01-2020
EXPIRATION DATE:          31-01-2021
Bulletin Type: Informational Only

## Motorola Solutions Technical Notification (MTN)

**TITLE:**   RAM Disk Full on VMS and vCenter.

**TECHNOLOGY:** ASTRO 25

**SYMPTOM(S):**
UEM message concerning VMS or VCS with Severity set to "info":  The ramdisk "tmp" is full. As a result, the file <file_name> could not be written.

Additional symptoms:
1.   Unable to login to ESXi via web interface
2.   hanging VMs and/or extremely slow performance,
3.   syslog memory exhaustion errors

**MODELS / SYSTEM RELEASES / KITS / DATECODES AFFECTED:**
System Release: ASTRO 25 2019.2

**SEVERITY RECOMMENDATION:**
Medium / Operational - Schedule to implement

**ROOT CAUSE / DEFINITIVE TEST:**
Issue in HP-AMS service running on ESXi 6.0/6.5 VMS which causes /tmp to become full.

DEFINITIVE TEST

| 1 | Establish the ssh connection to ESXi management interface IP address by using a **PuTTY** terminal emulator software. |
|---|---|
| | Log on as the `root` user. |
| | **Result**: A command prompt is displayed on **PuTTY** terminal emulator window. |
| 2 | In the prompt, execute the following commands: |

```
1)
esxcli software vib list | grep ams
amsd    650.11.4.0-18.4240417    HPE      PartnerSupported      2019-10-17


2)
ls -l  /tmp


rw-rr-    1 root     root              0 Jan  4 09:01 altbootbank.lck
rw-rr-    1 root     root      268271486 Jan  9 00:28 ams-bbUsg.txt
rw-rr-    1 root     root           2533 Jan  3 01:01 ams-ent.txt
rw-rr-    1 root     root              0 Jan  1 01:02 ams-fc.txt
rw-rr-    1 root     root            579 Dec 27 01:01 ams-fsys.txt
rw-rr-    1 root     root          48213 Dec 31 01:03 ams-hrswrun.txt
rw-rr-    1 root     root           1423 Dec 25 01:01 ams-ip.txt
rw-rr-    1 root     root            510 Dec 25 01:01 ams-ipv4.txt
rw-rr-    1 root     root             84 Dec 25 01:01 ams-ipv6.txt
```

```
rw-rr-     1 root     root              1278 Dec 15 01:01 ams-iscsi3.txt
rw-rr-     1 root     root                 9 Jan  9 00:28 ams-mem.txt
rw-rr-     1 root     root              3602 Dec 25 01:01 ams-nic-list.txt
rw-rr-     1 root     root               384 Dec 25 01:01 ams-route.txt
rw-rr-     1 root     root              3046 Dec 18 01:01 ams-sas.txt
rw-rr-     1 root     root                 0 Dec 18 01:01 ams-sas2.txt
rw-rr-     1 root     root                 0 Jan  9 00:28 ams-sata-dev.txt
rw-rr-     1 root     root              3046 Jan  9 00:28 ams-sata-stat.txt
rw-rr-     1 root     root                 0 Jan  9 00:28 ams-sata.txt
rw-rr-     1 root     root             48211 Dec 29 01:01 ams-swrun.txt
rw-rr-     1 root     root                 0 Jan  9 00:27 ams-sysmod.txt
rw-rr-     1 root     root              5200 Oct 17 05:35 ams-usb1.txt
rw-rr-     1 root     root              4608 Dec 25 01:01 ams-vsw.txt
rw-rr-     1 root     root                 0 Jan  9 00:28 amsbb.done
rw-rr-     1 root     root                 0 Dec 29 01:01 amscpqsw.done
rw-rr-     1 root     root                 0 Jan  3 01:01 amsent.done
rw-rr-     1 root     root                 0 Jan  9 00:27 amsfc.done
rw-rr-     1 root     root                 0 Dec 27 01:01 amsfsys.done
rw-rr-     1 root     root                 0 Dec 31 01:03 amshrsw.done


3)
vdf -h | grep -e "Ramdisk\|tmp"


Ramdisk                      Size      Used Available Use% Mounted on
tmp                          256M      256M       0B 100% -
```

**Result**: The issue is confirmed if  the following conditions are met:
      1)  the HP AMS version is 11.4.0
      2)  ams-bbUsg.txt log file is very large, approximately 200MB
      3)  tmp usage is over 90%
If the issue is confirmed you should proceed with **"WORKAROUNDS AND CORRECTIVE ACTIONS"** section of this MTN otherwise please cancel performing this document.

**WORKAROUNDS AND CORRECTIVE ACTIONS:**

| | |
|---|---|
| 1 | Establish the ssh connection to ESXi management interface IP address by using a **PuTTY** terminal emulator software.<br><br>Log on as the `root` user.<br><br>**Result**: A command prompt is displayed on **PuTTY** terminal emulator window. |
| 2 | In the prompt, execute the following commands one by one:<br><br>1)<br>`rm  /tmp/ams-bbUsg.txt`<br><br>2)<br>`vdf -h | grep -e "Ramdisk\|tmp"`<br><br>`Ramdisk                      Size      Used Available Use% Mounted on`<br>`tmp                          256M      128M      128M 50% -`<br><br>**Result**: The output of the last command must indicate the /tmp use is lower than 100 % |

**Important:**  The above workaround must be implemented periodically on a monthly basis until the problem is resolved by upgrading the HP-AMS service.

**RESOLUTIONS AND REPAIR PROCEDURES:**

At this time the workaround must be performed until a permanent fix is available


**PARTS REQUIRED (HARDWARE/SOFTWARE):**

**ADDITIONAL INFORMATION:**

**REFERENCE THE FOLLOWING DOCUMENTS/PROCESSES FOR INSTALLATION PROCEDURES**:

**WHEN TO APPLY RESOLUTION:**
After reboot __
After (re)installation __
After upgrade __
After power cycle __
After database restoration __
After failure __
On FRU replacement __
During maintenance __

Immediately _

As instructed ✕
Information only __


**LABOR ALLOWANCE:**
This is an informational bulletin.  No labor warranty is implied, intended or authorized for U.S. Domestic Partners/Customers.  Other regions should follow their own standard procedures.


For assistance with this bulletin please contact your MSI Technical support center
https://www.motorolasolutions.com/en_us/support.html