

HPE ProLiant DL380 Gen10 Server - Memory upgrade issue

Table of contents

- Issue
- Environment
- Cause
- Resolution

Issue

Customer has received 2933Mhz DIMMS as an upgrade for their 2666Mhz DIMM purchases.

When the customer installed the new DIMMs (2933MHZ), the server failed to POST as all LEDs were blinking on the server and nothing was happe ning.

Below CPU Models are being used on the server:

Processor (Hyperthreading Enabled)

Socket Processor Cfg Spd Max Spd Cores Stepping

Proc 1 Intel(R) Xeon(R) Gold 6154 CPU @ 3.00GHz 3.00 GHz 4.00 GHz 18/18 Skylake SP H0

Environment

HPE ProLiant DL380 Gen10 Server

OS: Windows

Cause

The above mentioned behaviour is by design and a limitation of the CPU as you can see within the shared documents from Intel and Quickspecks t he Maximum Memory Speed for Intel(R) Xeon(R) Gold 6154 CPU is 2666 MHz and this is why the server was not able to boot if the new DIMMs 29 33mhz are installed unless if you change the BIOS setting on the memory bus frequency than the server will booted fine.

Quickspeks DL380 Gen10 Page 9

https://h20195.www2.hpe.com/v2/getdocument.aspx?docname=a00008180enw#

Intel® Xeon® Gold 6154 Processor

https://ark.intel.com/content/www/us/en/ark/products/120495/intel-xeon-gold-6154-processor-24-75m-cache-3-00-ghz.html



Resolution

Updating the BIOS setting to the memory bus frequency to be 2667 MHZ, the server booted fine. with the 2933mhz DIMMS installed