GBT Spectrometer: Modified guppi_daq Software Format of the Buffer Block at Input to CPU Processing Thread

FITS Header (23 040 bytes) Stores telescope position, frequency, bandwidth, etc	
Number of actual heaps (1 to N)	Size of a single heap (4 bytes)
Heap counter for 1 st heap (4 bytes) Heap counter for 2 nd heap (4 bytes)	1 st heap valid? (4 bytes)
Heap counter for 2 nd heap (4 bytes)	2 nd heap valid? (4 bytes)
Heap counter for 4096 th heap (4 bytes)	4096 th heap valid? (4 bytes)
First heap (SPEAD heap for high-bandwidth modes: variable size)	
Second heap (SPEAD heap for high-bandwidth modes: variable size)	
N th heap (SPEAD heap for high-bandwidth modes: variable size)	
Unused space (< 1 heap)	

64 bits

Notes:

- Size of the block is variable. Typically 32MB.
- Unless specified, all fields are 64 bits
- The heap valid field is 4 bytes wide, but only has two valid values: 0 or 1.