In addition to fixes, the 6.3.0 SP2 maintenance release includes a number of new OS-kernel features:

- SH4A Processor Support
- Mutex optimization on SH4 and ARM
  - Up to 3x faster for uncontested mutexes
- Improved malloc
  - Speed improvements for small allocations
  - Reduced contention in highly-threaded apps
- Debug malloc enhancements
  - Memory leak detection
  - Deep stack traces