

Convolution Peak Performance

Architecture	Clock	Cores, Workers, Threads	Mercury SAL, Intel IPP 5.2	In House Library
CBE (Mercury)	3.2 GHz	8	15 GUPS	7.5 GUPS
Dual CBE (Mercury)	3.2 GHz	16	30 GUPS	15 GUPS
CBE (PS3, Sony)	3.2 GHz	6	11 GUPS	5.6 GUPS
Two socket Quad Core PC 45 nm (Intel)	3.0 GHz	8	5.7 GUPS	6.8 GUPS
Two socket Quad Core PC 65 nm (Intel)	3.0 GHz	8	4.5 GUPS	5.3 GUPS
Four socket Quad Core PC 65 nm (Intel)	2.9 GHz	16	8.0 GUPS	9.3 GUPS

New

For example 2.5 GU are required for the convolution of 512 projections of size 512^2 ,
11 GU are required for the convolution of 512 projections of size 1024^2 ,
and 22 GU are required for the convolution of 1024 projections of size 1024^2 .