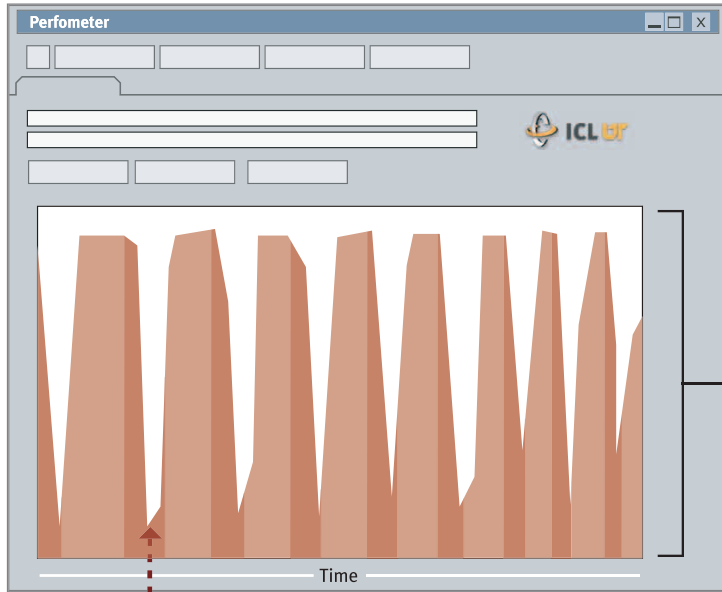
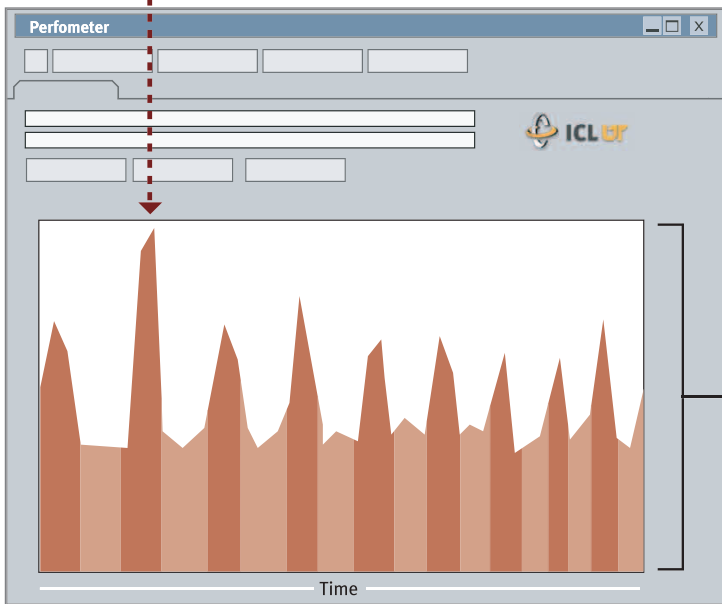


PAPI SHOWING A BOTTLENECK IN AN APPLICATION



Floating Point Instructions per second

--- NOTICE DROPS IN PERFORMANCE (SHOWN ABOVE)
--- CORRELATE TO PEAKS IN CACHE MISSES (SHOWN BELOW).



Level 1 Total Cache Misses



FUNCTION 1



FUNCTION 2

PAPI SHOWS THAT THE BOTTLENECK IS IN FUNCTION 2

PAPI enables software engineers to see, in near real time, the relation between software performance and processor events. Shown here is the relation between the two functions, which represent actual operations invoked by specific lines in the program's source code, and misses on the on-processor memory cache. PAPI can follow the course of multiple functions in this way, showing the same relationship for any of the events tracked by the processor's hardware counters.