Platform 2012 developers' conference final program

Grenoble, Minatec campus, December 1st and 2nd, 2011

Day 1	Room 221	Room 225
9:00	Welcome, introduction, program - D. Melpignano	
9:30	Keynote speech ST and CEA - J.M. Chery (ST) and J. F. Clerc (CEA)	
10:30	break	
10:45	P2012 status update and roadmap - E. Flamand	
11:15	Q&A	
11:30	Keynote speech (architecture) - L. Benini, D. Fuin	
12:15	Q&A	
12:30	lunch	
13:30	Software-managed memory on P2012 - A. Fedorova - Simon Fraser University	MIMO OFDM transceiver - D. Guenther et al.- RWTH
14:00	Instruction Cache Architecture for Tightly Coupled Shared-Memory Clusters - D. Bortolotti et al. - Univ. Bologna	An approach for modeling parallelization in the platform P2012 - Univ. Cantabria
14:30	Custom Memory Allocation on Platform 2012 - The 2PARMA Approach - I. Koutras - Univ. Athens	A Statically Analyzable Dataflow Model for Dynamic Streaming - P. Fradet et al. - INRIA, CRI
15:00	Flexible and Performing Kernels Dynamically Generated with deGoal for Embedded Systems - D. Courousse' et al. - CEA-LIST	Optimizing Explicit Data Transfers for Data Parallel Applications on Heterogeneous Multi-core Platforms - S. Saidi et al. - VERIMAG, STMicroelectronics
15:30	break	
15:45	From BIP System Model to Platform P2012: A Code Generation Flow - P. Bourgos et al. - UJF/VERIMAG, CEA-LETI	Applications mapping and scheduling, A tool for power/performance estimation - J-F. Kempf et al. - VERIMAG
16:15	Fast and Lightweight Support for Nested OpenMP Parallelism on a Multi-Cluster Platform - A. Marongiu - Univ. Bologna	A Portable Runtime for different P2012 hardware flavors - Y. Lhuillier - CEA-LIST
16:45	OpenMP-based HW Acceleration for On-Chip Multi-Core Shared-Memory Clusters - A. Marongiu - Univ. Bologna	
17:15	Compiling Applications for P2012 with the BIP Tool Chain - A. Basu - UJF/VERIMAG, CEA-LETI	
17:45	Wrap-up and conclusions	
19:30	Social dinner	

Day 2	Room 221	Rooms 222, 223, 224, 225
9:00	CMC announcement - P. Stokes, Y. Hariri	
9:30	Introduction to SW architecture - G. Haugou	
9:50	SDK2011.3 overview - B. Lavigueur	
10:50	break	Start of parallel coding hands-on sessions:
11:10	Developers' Q&A session + start of parallel sessions	Gepop simulation (G. Haugou), OpenCL (T. Lepley), Native Progr. Model (M. Leclercq), Linux driver & HW architecture (J.M. Zins, J.P. Cousin) - see back for details
12:00	lunch	
13:00	Parallel sessions	Continuation of parallel sessions
17:45	wrap-up and closure	

Day 2 parallel sessions

Time	Room 222	Room 223	Room 224	Room 225
11:00	**Demonstrators**	**NPM usage**: application parallelization strategies on multi-cluster	**Simulation with Gepop** : Q&A, explain how to develop SW using Gepop	**P2012 Linux driver, HW architecture Q&A**
12:00	lunch	lunch	lunch	lunch
13:00	**OpenCL for P2012 first steps**: programming model description, simple application development within Eclipse	**Custom programming models with NPM**: development and integration of custom runtime layers	**Gepop extensions**: Q&A, how to add new architectural blocks in Gepop	**P2012 Linux driver, HW architecture Q&A**
15:15	break	break	break	break
15:30	**OpenCL for P2012 advanced usage**: more complex usecase, parallelization strategies	**NPM usage**: application parallelization strategies on multi-cluster	**Simulation with Gepop** : Q&A, explain how to develop SW using Gepop	**P2012 Linux driver, HW architecture Q&A**
17:30	back to plenary / closure	back to plenary / closure	back to plenary / closure	back to plenary / closure