Workshop on Qualitative Reasoning

Stanford University

August 9-11, 1989

Program

Wednesday, August 9

9.00	Reasoning about assumptions in graphs of models	S. Addanki, R. Gemonini & J. S. Penberthy, IBM Yorktown
9.45	The reaction engine	O. Raiman, IBM Paris
10.30	*coffee*	
11.00	Comparative analysis and qualitative integral representations	C. Chiu & B. Kuipers, Texas
11.45	Simplification and abstraction of kinematic behaviors: heirarchical reasoning in mechanical devices	L. Joskowicz, IBM Yorktown
12.30	*Break for lunch*	
2.00	Reasoning about kinematic topology	B. Faltings, E. Baechler, J. Primus, Lausanne
2.30	Simulating both dynamic and kinematic behaviors of mechanisms	P. Pu, Connecticut
3.00	A predictive engine for the qualitative simulation of dynamic systems	M. Weigand & R. Leitch, Heriot-Watt
3.30	*coffee*	
4.00	Qualitative analysis of continuous dynamic systems by intelligent numerical experimentation	E. Sacks, Princeton
4.30	Dynamic across-time measurement interpretation	D. DeCoste, Illinois
5.00	Spatial Unification: qualitative spatial reasoning about steady-state mechanisms, an overview of current work.	D. R. Throop, Texas
5.30	*Break for dinner*	

Thursday, August 10

9.00	Stochastic analysis of qualitative dynamics	J. Doyle, MIT & E. Sacks, Princeton
9.45	Chaos, qualitative reasoning, and the predictability problem	B. Hubermann, XEROX-PARC, & P. Struss, Siemens
10.30	*coffee*	
11.00	Stratification: a new method of analysing discontinuous change	T. Nishida & S. Dosshita, Kyoto
11.45	A charge-carrier ontology for reasoning about electronics	Z-Y. Liu, Oregon
12.30	*Break for lunch*	

Afternoon free. The rooms will be open and can be used for meetings if required.

3.30	Reconvene with coffee	
4.00	Pushing the edge of the (QP) envelope	K. D. Forbus, Illinois
4.30	TEPS: the thought experiment approach to qualitative physics	D. L. Hibler & G. Biswas, Vanderbilt

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5.00	Qualitative and quantitative reasoning about thermodynamics	G. Skorstad & K. Forbus, Illinois
5.30	Building qualitative models of thermodynamic processes	J. W. Collins, Illinois
6.00	***Break for dinner***	
8.30	Panel discussion	

Friday, August 11

9.30	Two model abstraction techniques based on temporal grain size: aggregation and mixed models	Y. Iwasaki, Stanford
10.15	Diagnostic reasoning based on models at different levels of abstraction.	M. Gallanti et.al, CISE, Milan
11.00	*coffee*	
11.30	Automated model switching	D. S. Weld, Washington
12.15	***Break for lunch***	
2.00	Exploring naive topology: modelling the force pump	B. Randell & T. Cohn, Warwick
2.45	Qualitative change waves- the automatic detection of traffic accidents	P. Van Nypelseer, AITECH, Brussels
3.30	***Break***	
4.00	General meeting. Among the issues to be discussed: where will the next workshop be?	

4:50 UA 1247

The workshop will be held at the Hartley Conference Center, Room 130 in Mitchell Hall on the Stanford University campus.