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## **Errata**

for thesis

## Meta-Languages and Semantics for Equation-Based Modeling and Simulation

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Public defence: October 1, 2010 Latest errata update: October 8, 2010

- Page 66, first paragraph: "different form of *pattern matching*" should be "different form of *pattern matching* on type tags at run-time".
- Page 66, last paragraph of section "Overloading": Sentence "Modelica is currently not supporting..." should be "Modelica is from version 3.1 (released May 2009) supporting overloading of operators."
- Page 78, Section 6.2.1: The term *name* means a sequence of one or more identifiers separated with dots, e.g., x.y.z, M.x, or just x
- Page 79, Figure 6.2: *Inum* is a literal real number.
- Page 97, paragraph before 7.1.1: Value 52.10 should be 71.
- Page 106, the line before Definition 7.2.3:  $e_1$  should be e.
- Page 131, second example: op e e2 should be op e1 e2.
- Page 143, last paragraph: (L-APPM2) should be (L-APPM5).
- Page 150, proof of Lemma 10.7 (Substitution): "derivation of  $\Gamma \vdash e : \tau$ " should be "derivation of the statement  $\Gamma, y : \tau' \vdash e : \tau$ ".
- Page 157, rule (RTC-REFL):  $e|U \longrightarrow^* e'|U'$  should be  $e|U \longrightarrow^* e|U$ .
- Page 158, missing case " $FV(\langle \tau_2 \Leftarrow \tau_1 \rangle e) = FV(e)$ " of the definition of free variables and case " $[x \mapsto e]\langle \tau_2 \Leftarrow \tau_1 \rangle e_1 = \langle \tau_2 \Leftarrow \tau_1 \rangle ([x \mapsto e]e_1)$ " of the definition of substitution.
- Page 171, first paragraph: "component M" should be "component SC".
- Page 194, end of second paragraph: Sentence "We should again note..." should be removed.
- Page 196: Performance tests were executed on a MacBook, 2.2 GHz Intel Core 2 Duo, 4 GB 667 MHz DDR2 SDRAM running Mac OS X version 10.5.8.
- Page 217. Missing operator precedence and associativity. All operators are left associative, except "^" and "^." that are right associative. Operators "U-" and "U-." represent the unary minus for "-" and "-." respectively. Terminal with is used to resolve an ambiguity in the grammar. Operators are listed (comma separated) in precedence order (highest to lowest). Operators within parentheses have the same precedence: ( "U-" "U-." "--" "--." ), ( "^" "^."), "mod",

- Page 220, production rule pat\_op: Text "pat\_op OP pat\_op" should be "pat\_op operator pat\_op".
- Page 223, first item in comments:  $lcase(v, x_1, x_1, e_1, e_2)$  should be  $lcase(v, x_1, x_2, e_1, e_2)$ .
- Page 250, item [42]: "D. E. Comer" should be "Peter J. Denning, Douglas E. Comer"
- Page 253, item [80]: "Gilles Kah" should be "Niel D. Jones, Peter Sestoft, and Harald Søndergaard".

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