

# **SV-EC top 25 list**

## **Vote result and discussion**

May 13 2010

# SV-EC voting process

- SV-EC participants voted on top 25 prioritized issues for next PAR.
- 13 members participated.
  - Gave 1 (highest priority) to 25 (lowest priority)
- Total of 218 line items were listed
  - 16 extra no-mantis-number items.
- Voting ended May 10 2010

# Highlights

- Mantis item 2997 and 1356 were duplicates and were both in the list. Members voted to close 2997 and move 1356 to its place.
- No-Mantis-5 was a duplicate of 2991 (sv-bc top 25 list), voted to be removed from sv-ec top 25 list. (Enumeration extension)
- Mantis 3082 was created for No-Mantis-10 item (no 8 on the list)
- 8 out of 25 are listed as Enhancements.
- Covers at least 6 of top 10 items in February recommendation list
- Multiple issues within some mantis item (3082)

# Top 25 list

- Estimated degrees of difficulty:
  - High: At least 5 of 25
  - Medium: At least 9 out of 25
  - Low: at least 7 out of 25
- Categories:
  - Built-in Methods: 1
  - Class / OO: 11
  - Clocking Block: 2
  - Functional Coverage: 2
  - Process Control: 2
  - Randomization: 2
  - Virtual Interface: 4
  - Various: 1

# SV-EC top 25 list: Vote result (1)

top 25 Rank	Mantis ID	Number of Votes	weighted vote	Summary	Degrees of difficulty	Category
1	2848	7	159	Is it legal to assign an interface containing class declaration to a virtual interface	med	Virtual Interface and class
2	3002	8	125	Aspect Oriented Programming (AOP) features	High	class
3	3046	8	112	Dotted names within inlined constraints	Low	class
4	1356	6	112	Multiple Inheritance	High	class
5	3001	9	102	Proper Polymorphic behavior of instantiation	low	class
6	2999	7	99	Class Handle reference inside of Constraints	med	class
7	3003	6	98	Constraint Composition	High	Randomization
8	3082	7	96	(4) Ambiguity resolution (see slide 10 for examples of parts of the Standard that have been interpreted differently by different simulators)		Various
9	2845	4	84	virtual interface type checking versus interface type that had been defparam'ed	high	Virtual Interface
10	2956	4	76	clarify class 'process' definition (9.7 vs 18.13.3, 18.13.4, 18.13.5)	low	Process control
11	2505	4	76	class select: what is allowed after the dot?	low	class
12	2735	4	73	Ballot Comment #48: Chaining of method calls	med	class
13	1706	4	72	Meaning of static prefix for virtual interface assignments		Virtual Interfaces

# SV-EC top 25 list: Vote result (2)

top 25 Rank	Mantis ID	Number of Votes	weighted vote	Summary	Degrees of difficulty	Category
14	2488	4	69	Are virtual method calls legal within class constructors?	med	VI OO classes
15	2112	6	69	Remove restrictions on NBA assignments to class members	med	class
16	3028	6	68	constraints for unique array elements.	Med	Randomization
17	2950	4	67	virtual method prototype matching	low	class
18	2794	4	64	Clarify queue methods return status	low	class
19	2993	4	63	Cross cover points across different cover groups	med	Built-in Methods
20	1442	3	63	Clocking blocks legal in modports, missing from text description in 20.9		Functional Coverage
21	2953	6	61	Algorithmic generation of covergroup bin contents	high	clocking block
22	1349	5	61	fork/join_none: what if parent thread terminates without blocking statement?		Functional Coverage
23	2949	4	60	LRM is silent about the semantics of referencing a clocking block output	low	Process control
24	2451	6	58	Omitting body defaults	med	clocking block
25	2987	6	56	Soft Constraints	med	class

# Expectations and Feedback

- The top 5 items MAY keep us busy for one year
  - AOP and Multiple Inheritance will require good amount of work
  - Some of the 'clarifications' may take a lot of time as well
  - Addressing the top 25 items may require addressing other items in the database that are not in the top 25.
- Maybe able to narrow the scope of some to make it more easily adopted
- Reduce inefficiencies.
  - Can work on trivial mantis items not part of the top 25
- Take a look at the 10 next items as well.
- Issues will require proposals to be addressed.
- We may require a face-to-face meeting once the 'scope' is approved and guidelines are set

# SV-EC top 25 list: Vote result

## The next 10 items

Rank	Mantis ID	Number of Votes	weighted vote	Summary	Degrees of difficulty	Category
26	3006	5	55	LRM doesn't say explicitly what should happen if null pointer is randomized	low	class
27	3004	5	55	Ability to declare/qualify classes/methods/variables/constraints final	med	class
28	2998	4	55	Solve Before enhanced	low	Randomization
29	2117	3	52	Allow extending of covergroups in classes	high	Functional Coverage
30	No Mantis 6	5	51	(3) Allow reuse of enumerated names (slide 31)		cross-committee
31	2928	3	50	ambiguous restriction on function calls in constraint expressions	low	Randomization
32	2787	3	50	reference via scope operator to parametrized superclass item	med	class
33	2972	3	49	add class constructor/method, task/function overloading	High	class
34	2996	4	49	Method overloading	High	class
35	2988	2	48	Defaults Constraints	med	Randomization
36	No Mantis 4	2	47	(1) AOP when-inheritance (slide 31)	High	Class/AOP