

Stability for Plans, allowing for propagation.

For each state record the number of successes and failures.

Calculate probability of success based on successes/(successes+failures) and the change in probability between each record. Given example.

Outcome	S	F	S	F	F	S	S
P(s)	1.0	0.50	0.66	0.50	0.40	0.50	0.57
$\Delta p(S)$	-	0.50	0.16	0.16	0.10	0.10	0.07
Fraction	1/1	1/2	2/3	2/4	2/5	3/6	4/7

Algorithm

Based on State

 If successful

 Record Success.

 Propagate.

 If unsuccessful

 Record Failure.

 If all plans under parent goal are considered stable.

 Propagate Fail.

A plan is considered stable when $(NumberOfFails + NumberOfSuccesses) > k$ and $\epsilon > \Delta p(S)$