

Eclipse APP4MC 1.0



NEW AND NOTEWORTHY

APP4MC 1.0 (NOV 2020)

General description of platform changes

Model changes

- ▶ Removed MeasurementModel (deprecated since 0.9.9 and replaced by new ATDB)
- ▶ Removed ProcessEventType 'deadline'

Product

- ▶ New Amalthea Trace Database (ATDB)
- ▶ New transformations BTF -> ATDB, ATDB -> Amalthea
- ▶ Extended Metrics Viewer

UI

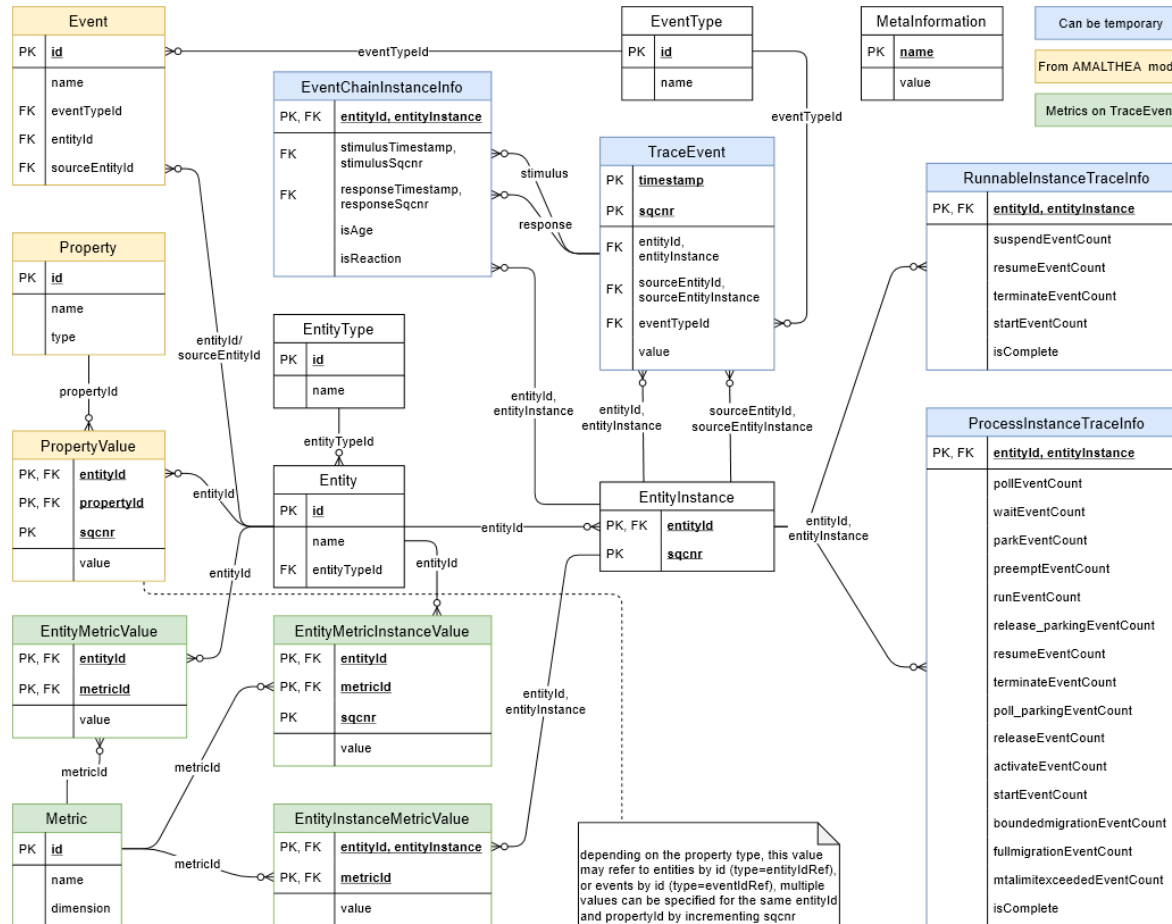
- ▶ Added possibility to refresh a pinned visualization

Amalthea Trace Database

Amalthea Trace Database

- ▶ **SQLite database**
- ▶ **structured and consistent representation of**
 - trace data
 - extract of model content
 - metrics
- ▶ **suitable for exchange of metrics**
- ▶ **intended as a replacement for the measurement sub model**

Amalthea Trace Database



Extended Metrics Viewer

The screenshot shows the 'Extended Metrics Viewer' window for a trace file named 'trace-example.atdb'. The window displays a table with columns for 'Process name', 'Metric', 'Minimum [ns]', 'Maximum [ns]', 'Average [ns]', and 'Std. Dev. [ns]'. The data is organized into two groups of metrics, one for 'Task_10MS' (rows 1-15) and another for an unnamed task (rows 16-21). The table is divided into three sections: 'Process Time Metrics', 'Runnable Time Metrics', and 'EventChain Time Metrics'.

	Process name	Metric	Minimum [ns]	Maximum [ns]	Average [ns]	Std. Dev. [ns]
1	Task_10MS	startDelayTime	0	165508448	140427337.65	43489618.66
2		runningTime	12995540	13401390	13199933.70	73881.47
3		pollingTime	1120	1121	1120.09	0.29
4		parkingTime				
5		waitingTime	0	0	0.00	0.00
6		readyTime				
7		responseTime	13125715	178833500	153628391.44	43490546.46
8		coreExecution...				
9		netExecutionTi...	12996660	13402510	13201053.80	73881.48
10		grossExecutio...				
11		activateToActi...	10000000	10000000	10000000.00	0.00
12		startToStart	13139340	26666725	17602330.26	4308101.53
13		endToEnd	13149835	26770070	17596217.70	4286840.00
14		endToStart	0	13541010	4403339.48	4293717.19
15		slack	-165141026	-3125715	-120217549.48	52107737.37
16		startDelayTime	13125715	178833500	159650165.43	38245936.43
17		runningTime	370000	429740	402166.19	12849.30
18		pollingTime	30	30	30.00	
19		parkingTime				0.00
20		waitingTime	0	0	0.00	
21		readyTime				

Process Time Metrics | Runnable Time Metrics | EventChain Time Metrics