My Title

We, the Authors

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Work Group:	627bc058-c28d-4680
Time Frame:	2021-08-01 - 2021-08-31

Contents

1 Basic Stats

1.1 Full Sample

In the given time frame, 2613 tasks were started and 2475 ended. 2465 (93.98 %) of them started and ended within the given time frame. Sections 2 and 3 will only consider those tasks which started and ended within the given time frame.
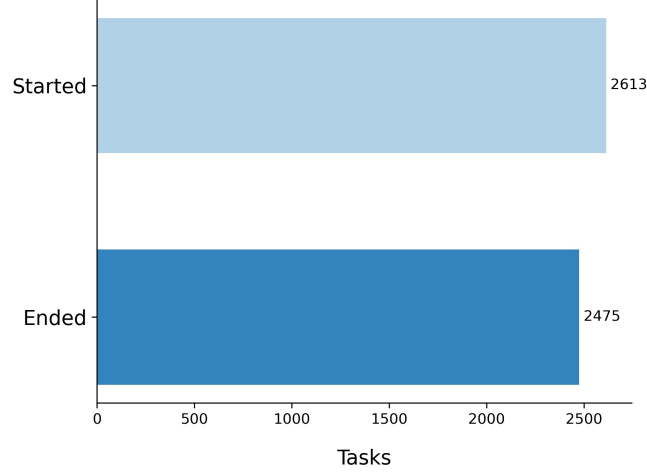

Figure 1: Number of started and ended tasks.

1.2 User Split

The number of tasks (started and ended) ranged from 1243 by 3a1899e0-4f86-44e9 to 4 by 15b0ff0f-8f2c-4a2b. A total of 6 user(s) started and ended at least 10 tasks. Only for those users, boxplots are computed in Section 3.
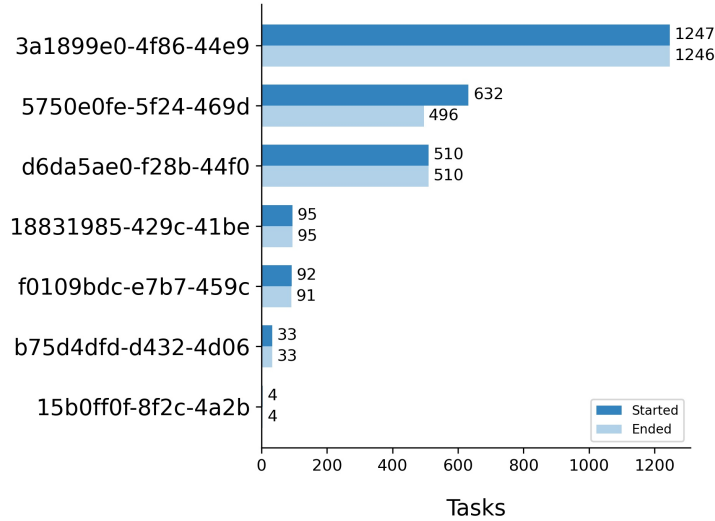

Figure 2: Number of started and ended tasks by different users.

1.3 Partition Split

The number of tasks (started and ended) ranged from 808 on the bigmem partiton to 120 on debug. A total of 5 partition(s) were used to complete (start and end) at least 10 tasks. Only for those partitions, boxplots are computed in Section 3.
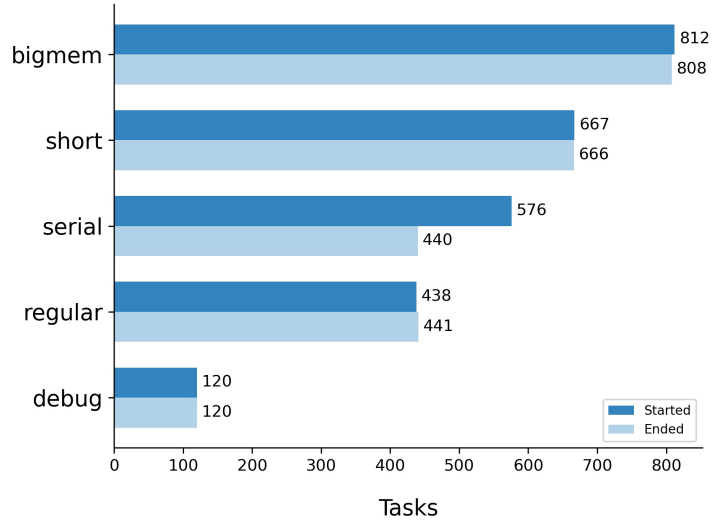
Figure 3: Number of started and ended tasks on different partitions.

2 Task Metrics

2.1 Full Sample

In the full sample, the task durations ranged from 0 to 7200 minutes (M = 1051 min). The number of allocated CPUs ranged from 2 to 120 (M = 38). Finally, the CPU Time (task duration * allocated CPUs) ranged from 0 to 691211 minutes (M = 28389 min).

	Allocated CPUs	Task Duration (min)	CPU Time
min	2	0	0
5quant	24	0	0
25quant	24	45	1215
median	48	181	6984
75quant	48	720	34582
95quant	48	3566	85618
max	120	7200	691211
mean	38	1051	28389

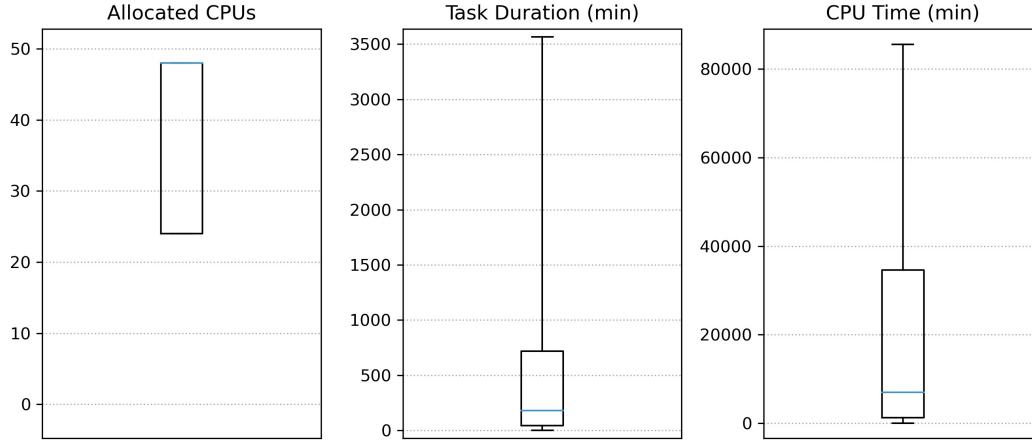Table 1: Task metrics for the full sample.

Figure 4: Distributions of task duration, allocated CPUs, and CPU time. Whiskers indicate the 5th and 95th percentiles.

2.2 User Split

Below, you can find the distributions of the task metrics for each user. In the table, all users are listed. Boxplots are only generated for users with at least 10 tasks.

	Num Tasks	Allocated CPUs	Task Duration	CPU Time
3a1899e0-4f86-44e9	1250	(24, 40, 120)	(0, 639, 7200)	(0, 17315, 691211)
5750e0fe-5f24-469d	639	(2, 26, 96)	(0, 2872, 3865)	(1, 62526, 268750)
d6da5ae0-f28b-44f0	510	(48, 48, 48)	(0, 692, 720)	(0, 33201, 34584)
18831985-429c-41be	95	(24, 24, 24)	(0, 0, 0)	(0, 2, 8)
f0109bdc-e7b7-459c	92	(24, 28, 48)	(0, 26, 163)	(0, 816, 7007)
b75d4dfd-d432-4d06	33	(24, 24, 24)	(1063, 1105, 1202)	(25501, 26522, 28840)
15b0ff0f-8f2c-4a2b	4	(24, 24, 24)	(0, 1, 1)	(4, 15, 24)

Table 2: Task metrics for different users. Values in parantheses indicate (min, mean, max). Time is measured in seconds.
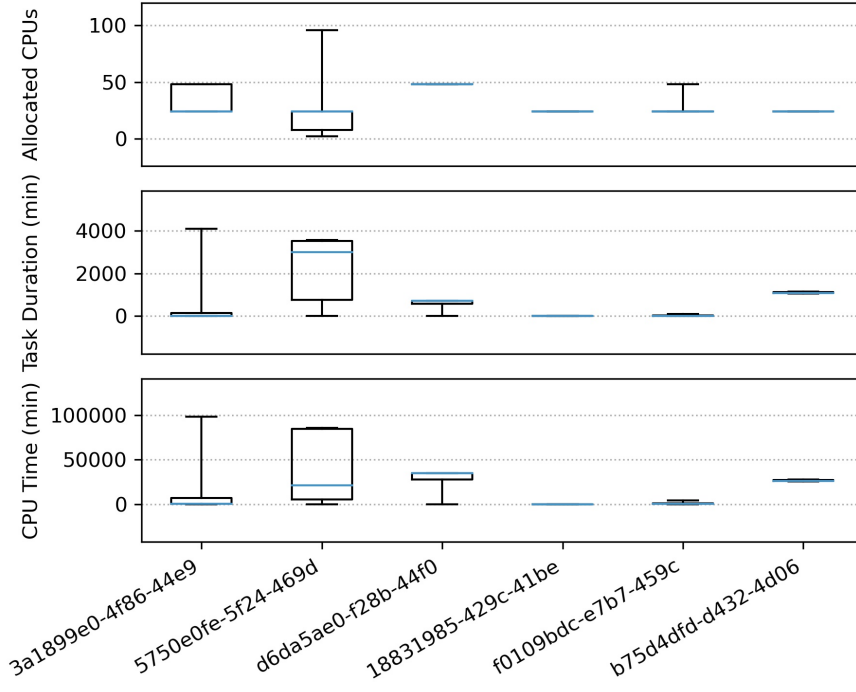
Figure 5: Distributions of task duration, allocated CPUs, and CPU time for different users. Whiskers indicate the 5th and 95th percentiles.

2.3 Partition Split

Below, you can find the distributions of the task metrics for each partition. In the table, all partitions are listed. Boxplots are only generated for partitions with at least 10 tasks.

	Num Tasks	Allocated CPUs	Task Duration	CPU Time
bigmem	812	(48, 48, 48)	(0, 76, 720)	(0, 3625, 34581)
short	667	(24, 43, 48)	(0, 587, 720)	(0, 26837, 34584)
serial	583	(2, 21, 24)	(0, 3193, 3865)	(1, 67115, 92759)
regular	441	(24, 28, 120)	(0, 1726, 7200)	(0, 45916, 691211)
debug	120	(24, 32, 96)	(0, 1, 29)	(0, 43, 699)

Table 3: Task metrics for different partitions. Values in parantheses indicate (min, mean, max). Time is measured in seconds.
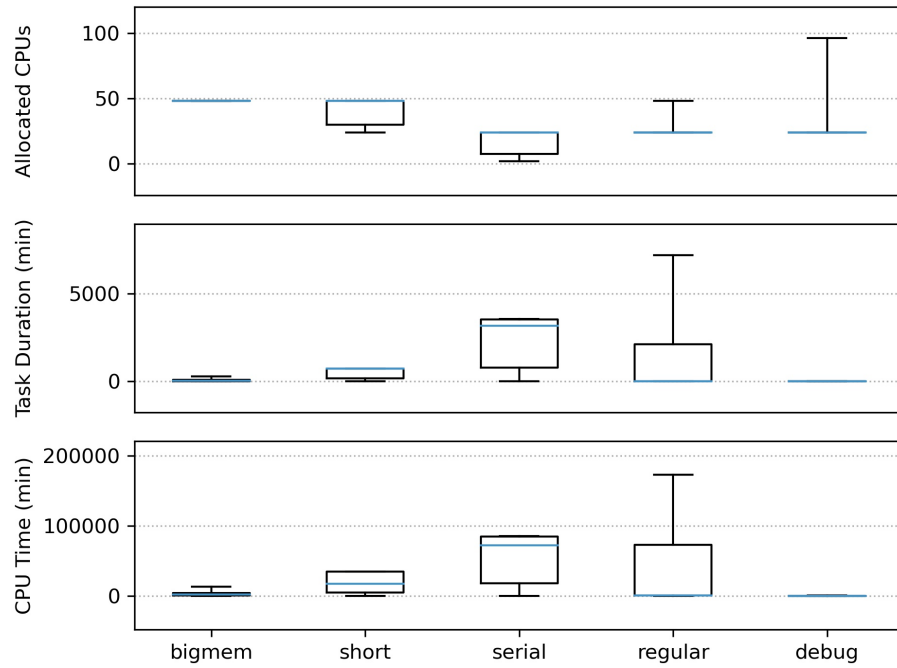
Figure 6: Distributions of task duration, allocated CPUs, and CPU time for different partitions. Whiskers indicate the 5th and 95th percentiles.

3   Termination Stats

From the 2465 tasks that started and ended in the given time frame, 1297 were completed successfully, 465 were actively cancelled, 691 were ended due to a timeout, and 12 failed for other reasons.
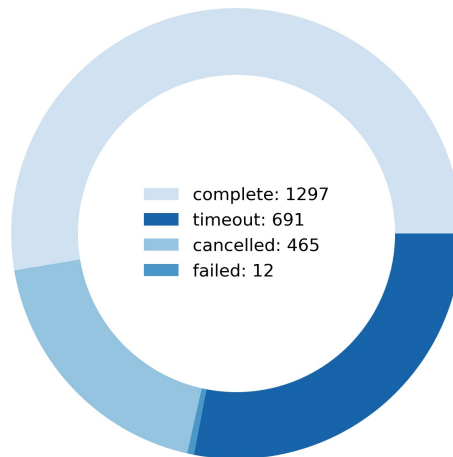

complete: 1297
timeout: 691
cancelled: 465
failed: 12

Figure 7: Termination stats for the full sample.