

```
1 /Library/Java/JavaVirtualMachines/jdk-11.0.2.jdk/Contents/Home/bin/j
2 Please Enter number of customers :
3 100
4 ABLE CUSTOMER SIZE : 1
5 CID : 1
6 Time Since Last Arrival : 0
7 Arrival Time : 0
8 Service Time : 4
9 Time Server Begins : 0
10 Time Customer waits in Queue : 0
11 Time Service End : 4
12 Time Customer Spends in System : 4
13 Idle Time of Server : 0
14 Random Digit for Service Time : 59
15 Random Digit for Arrival Time : 48
16 Service Name : ABLE
17 +++++
18 CID : 2
19 Time Since Last Arrival : 1
20 Arrival Time : 1
21 Service Time : 4
22 Time Server Begins : 1
23 Time Customer waits in Queue : 0
24 Time Service End : 5
25 Time Customer Spends in System : 4
26 Idle Time of Server : 0
27 Random Digit for Service Time : 47
28 Random Digit for Arrival Time : 13
29 Service Name : BACKER
30 +++++
31 CID : 3
32 Time Since Last Arrival : 1
33 Arrival Time : 2
34 Service Time : 2
35 Time Server Begins : 4
36 Time Customer waits in Queue : 2
37 Time Service End : 6
38 Time Customer Spends in System : 4
39 Idle Time of Server : 0
40 Random Digit for Service Time : 29
41 Random Digit for Arrival Time : 21
42 Service Name : ABLE
43 +++++
44 CID : 4
45 Time Since Last Arrival : 2
46 Arrival Time : 4
47 Service Time : 6
48 Time Server Begins : 5
49 Time Customer waits in Queue : 1
50 Time Service End : 11
51 Time Customer Spends in System : 7
52 Idle Time of Server : 0
53 Random Digit for Service Time : 85
54 Random Digit for Arrival Time : 44
55 Service Name : BACKER
56 +++++
57 CID : 5
58 Time Since Last Arrival : 3
59 Arrival Time : 7
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60 Service Time : 5
61 Time Server Begins : 7
62 Time Customer waits in Queue : 0
63 Time Service End : 12
64 Time Customer Spends in System : 5
65 Idle Time of Server : 1
66 Random Digit for Service Time : 98
67 Random Digit for Arrival Time : 75
68 Service Name : ABLE
69 ++++++
70 CID : 6
71 Time Since Last Arrival : 2
72 Arrival Time : 9
73 Service Time : 3
74 Time Server Begins : 11
75 Time Customer waits in Queue : 2
76 Time Service End : 14
77 Time Customer Spends in System : 5
78 Idle Time of Server : 0
79 Random Digit for Service Time : 7
80 Random Digit for Arrival Time : 40
81 Service Name : BACKER
82 ++++++
83 CID : 7
84 Time Since Last Arrival : 1
85 Arrival Time : 10
86 Service Time : 5
87 Time Server Begins : 12
88 Time Customer waits in Queue : 2
89 Time Service End : 17
90 Time Customer Spends in System : 7
91 Idle Time of Server : 0
92 Random Digit for Service Time : 93
93 Random Digit for Arrival Time : 16
94 Service Name : ABLE
95 ++++++
96 CID : 8
97 Time Since Last Arrival : 2
98 Arrival Time : 12
99 Service Time : 4
100 Time Server Begins : 14
101 Time Customer waits in Queue : 2
102 Time Service End : 18
103 Time Customer Spends in System : 6
104 Idle Time of Server : 0
105 Random Digit for Service Time : 56
106 Random Digit for Arrival Time : 52
107 Service Name : BACKER
108 ++++++
109 CID : 9
110 Time Since Last Arrival : 1
111 Arrival Time : 13
112 Service Time : 2
113 Time Server Begins : 17
114 Time Customer waits in Queue : 4
115 Time Service End : 19
116 Time Customer Spends in System : 6
117 Idle Time of Server : 0
118 Random Digit for Service Time : 15
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119 Random Digit for Arrival Time : 11
120 Service Name : ABLE
121 ++++++
122 CID : 10
123 Time Since Last Arrival : 3
124 Arrival Time : 16
125 Service Time : 3
126 Time Server Begins : 18
127 Time Customer waits in Queue : 2
128 Time Service End : 21
129 Time Customer Spends in System : 5
130 Idle Time of Server : 0
131 Random Digit for Service Time : 13
132 Random Digit for Arrival Time : 74
133 Service Name : BACKER
134 ++++++
135 CID : 11
136 Time Since Last Arrival : 2
137 Arrival Time : 18
138 Service Time : 5
139 Time Server Begins : 19
140 Time Customer waits in Queue : 1
141 Time Service End : 24
142 Time Customer Spends in System : 6
143 Idle Time of Server : 0
144 Random Digit for Service Time : 95
145 Random Digit for Arrival Time : 34
146 Service Name : ABLE
147 ++++++
148 CID : 12
149 Time Since Last Arrival : 2
150 Arrival Time : 20
151 Service Time : 5
152 Time Server Begins : 21
153 Time Customer waits in Queue : 1
154 Time Service End : 26
155 Time Customer Spends in System : 6
156 Idle Time of Server : 0
157 Random Digit for Service Time : 65
158 Random Digit for Arrival Time : 27
159 Service Name : BACKER
160 ++++++
161 CID : 13
162 Time Since Last Arrival : 2
163 Arrival Time : 22
164 Service Time : 3
165 Time Server Begins : 24
166 Time Customer waits in Queue : 2
167 Time Service End : 27
168 Time Customer Spends in System : 5
169 Idle Time of Server : 0
170 Random Digit for Service Time : 33
171 Random Digit for Arrival Time : 32
172 Service Name : ABLE
173 ++++++
174 CID : 14
175 Time Since Last Arrival : 2
176 Arrival Time : 24
177 Service Time : 5
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178 Time Server Begins : 26
179 Time Customer waits in Queue : 2
180 Time Service End : 31
181 Time Customer Spends in System : 7
182 Idle Time of Server : 0
183 Random Digit for Service Time : 69
184 Random Digit for Arrival Time : 55
185 Service Name : BACKER
186 ++++++
187 CID : 15
188 Time Since Last Arrival : 2
189 Arrival Time : 26
190 Service Time : 5
191 Time Server Begins : 27
192 Time Customer waits in Queue : 1
193 Time Service End : 32
194 Time Customer Spends in System : 6
195 Idle Time of Server : 0
196 Random Digit for Service Time : 87
197 Random Digit for Arrival Time : 35
198 Service Name : ABLE
199 ++++++
200 CID : 16
201 Time Since Last Arrival : 2
202 Arrival Time : 28
203 Service Time : 3
204 Time Server Begins : 31
205 Time Customer waits in Queue : 3
206 Time Service End : 34
207 Time Customer Spends in System : 6
208 Idle Time of Server : 0
209 Random Digit for Service Time : 26
210 Random Digit for Arrival Time : 38
211 Service Name : BACKER
212 ++++++
213 CID : 17
214 Time Since Last Arrival : 2
215 Arrival Time : 30
216 Service Time : 4
217 Time Server Begins : 32
218 Time Customer waits in Queue : 2
219 Time Service End : 36
220 Time Customer Spends in System : 6
221 Idle Time of Server : 0
222 Random Digit for Service Time : 67
223 Random Digit for Arrival Time : 49
224 Service Name : ABLE
225 ++++++
226 CID : 18
227 Time Since Last Arrival : 2
228 Arrival Time : 32
229 Service Time : 3
230 Time Server Begins : 34
231 Time Customer waits in Queue : 2
232 Time Service End : 37
233 Time Customer Spends in System : 5
234 Idle Time of Server : 0
235 Random Digit for Service Time : 35
236 Random Digit for Arrival Time : 48
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237 Service Name : BACKER
238 ++++++
239 CID : 19
240 Time Since Last Arrival : 2
241 Arrival Time : 34
242 Service Time : 4
243 Time Server Begins : 36
244 Time Customer waits in Queue : 2
245 Time Service End : 40
246 Time Customer Spends in System : 6
247 Idle Time of Server : 0
248 Random Digit for Service Time : 78
249 Random Digit for Arrival Time : 35
250 Service Name : ABLE
251 ++++++
252 CID : 20
253 Time Since Last Arrival : 3
254 Arrival Time : 37
255 Service Time : 5
256 Time Server Begins : 37
257 Time Customer waits in Queue : 0
258 Time Service End : 42
259 Time Customer Spends in System : 5
260 Idle Time of Server : 0
261 Random Digit for Service Time : 72
262 Random Digit for Arrival Time : 70
263 Service Name : BACKER
264 ++++++
265 CID : 21
266 Time Since Last Arrival : 3
267 Arrival Time : 40
268 Service Time : 4
269 Time Server Begins : 40
270 Time Customer waits in Queue : 0
271 Time Service End : 44
272 Time Customer Spends in System : 4
273 Idle Time of Server : 0
274 Random Digit for Service Time : 78
275 Random Digit for Arrival Time : 83
276 Service Name : ABLE
277 ++++++
278 CID : 22
279 Time Since Last Arrival : 2
280 Arrival Time : 42
281 Service Time : 4
282 Time Server Begins : 42
283 Time Customer waits in Queue : 0
284 Time Service End : 46
285 Time Customer Spends in System : 4
286 Idle Time of Server : 0
287 Random Digit for Service Time : 58
288 Random Digit for Arrival Time : 31
289 Service Name : BACKER
290 ++++++
291 CID : 23
292 Time Since Last Arrival : 4
293 Arrival Time : 46
294 Service Time : 5
295 Time Server Begins : 46
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296 Time Customer waits in Queue : 0
297 Time Service End : 51
298 Time Customer Spends in System : 5
299 Idle Time of Server : 2
300 Random Digit for Service Time : 90
301 Random Digit for Arrival Time : 90
302 Service Name : ABLE
303 ++++++
304 CID : 24
305 Time Since Last Arrival : 4
306 Arrival Time : 50
307 Service Time : 6
308 Time Server Begins : 50
309 Time Customer waits in Queue : 0
310 Time Service End : 56
311 Time Customer Spends in System : 6
312 Idle Time of Server : 4
313 Random Digit for Service Time : 91
314 Random Digit for Arrival Time : 94
315 Service Name : BACKER
316 ++++++
317 CID : 25
318 Time Since Last Arrival : 3
319 Arrival Time : 53
320 Service Time : 2
321 Time Server Begins : 53
322 Time Customer waits in Queue : 0
323 Time Service End : 55
324 Time Customer Spends in System : 2
325 Idle Time of Server : 2
326 Random Digit for Service Time : 9
327 Random Digit for Arrival Time : 73
328 Service Name : ABLE
329 ++++++
330 CID : 26
331 Time Since Last Arrival : 2
332 Arrival Time : 55
333 Service Time : 2
334 Time Server Begins : 55
335 Time Customer waits in Queue : 0
336 Time Service End : 57
337 Time Customer Spends in System : 2
338 Idle Time of Server : 0
339 Random Digit for Service Time : 4
340 Random Digit for Arrival Time : 28
341 Service Name : ABLE
342 ++++++
343 CID : 27
344 Time Since Last Arrival : 2
345 Arrival Time : 57
346 Service Time : 4
347 Time Server Begins : 57
348 Time Customer waits in Queue : 0
349 Time Service End : 61
350 Time Customer Spends in System : 4
351 Idle Time of Server : 0
352 Random Digit for Service Time : 63
353 Random Digit for Arrival Time : 48
354 Service Name : ABLE
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355 ++++++
356 CID : 28
357 Time Since Last Arrival : 4
358 Arrival Time : 61
359 Service Time : 5
360 Time Server Begins : 61
361 Time Customer waits in Queue : 0
362 Time Service End : 66
363 Time Customer Spends in System : 5
364 Idle Time of Server : 0
365 Random Digit for Service Time : 91
366 Random Digit for Arrival Time : 88
367 Service Name : ABLE
368 ++++++
369 CID : 29
370 Time Since Last Arrival : 2
371 Arrival Time : 63
372 Service Time : 4
373 Time Server Begins : 63
374 Time Customer waits in Queue : 0
375 Time Service End : 67
376 Time Customer Spends in System : 4
377 Idle Time of Server : 7
378 Random Digit for Service Time : 59
379 Random Digit for Arrival Time : 49
380 Service Name : BACKER
381 ++++++
382 CID : 30
383 Time Since Last Arrival : 2
384 Arrival Time : 65
385 Service Time : 5
386 Time Server Begins : 66
387 Time Customer waits in Queue : 1
388 Time Service End : 71
389 Time Customer Spends in System : 6
390 Idle Time of Server : 0
391 Random Digit for Service Time : 90
392 Random Digit for Arrival Time : 26
393 Service Name : ABLE
394 ++++++
395 CID : 31
396 Time Since Last Arrival : 1
397 Arrival Time : 66
398 Service Time : 6
399 Time Server Begins : 67
400 Time Customer waits in Queue : 1
401 Time Service End : 73
402 Time Customer Spends in System : 7
403 Idle Time of Server : 0
404 Random Digit for Service Time : 98
405 Random Digit for Arrival Time : 10
406 Service Name : BACKER
407 ++++++
408 CID : 32
409 Time Since Last Arrival : 2
410 Arrival Time : 68
411 Service Time : 5
412 Time Server Begins : 71
413 Time Customer waits in Queue : 3
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414 Time Service End : 76
415 Time Customer Spends in System : 8
416 Idle Time of Server : 0
417 Random Digit for Service Time : 87
418 Random Digit for Arrival Time : 35
419 Service Name : ABLE
420 ++++++
421 CID : 33
422 Time Since Last Arrival : 1
423 Arrival Time : 69
424 Service Time : 6
425 Time Server Begins : 73
426 Time Customer waits in Queue : 4
427 Time Service End : 79
428 Time Customer Spends in System : 10
429 Idle Time of Server : 0
430 Random Digit for Service Time : 88
431 Random Digit for Arrival Time : 1
432 Service Name : BACKER
433 ++++++
434 CID : 34
435 Time Since Last Arrival : 2
436 Arrival Time : 71
437 Service Time : 3
438 Time Server Begins : 76
439 Time Customer waits in Queue : 5
440 Time Service End : 79
441 Time Customer Spends in System : 8
442 Idle Time of Server : 0
443 Random Digit for Service Time : 44
444 Random Digit for Arrival Time : 28
445 Service Name : ABLE
446 ++++++
447 CID : 35
448 Time Since Last Arrival : 3
449 Arrival Time : 74
450 Service Time : 2
451 Time Server Begins : 79
452 Time Customer waits in Queue : 5
453 Time Service End : 81
454 Time Customer Spends in System : 7
455 Idle Time of Server : 0
456 Random Digit for Service Time : 16
457 Random Digit for Arrival Time : 68
458 Service Name : ABLE
459 ++++++
460 CID : 36
461 Time Since Last Arrival : 1
462 Arrival Time : 75
463 Service Time : 5
464 Time Server Begins : 79
465 Time Customer waits in Queue : 4
466 Time Service End : 84
467 Time Customer Spends in System : 9
468 Idle Time of Server : 0
469 Random Digit for Service Time : 71
470 Random Digit for Arrival Time : 17
471 Service Name : BACKER
472 ++++++
```



```
473 CID : 37
474 Time Since Last Arrival : 2
475 Arrival Time : 77
476 Service Time : 5
477 Time Server Begins : 81
478 Time Customer waits in Queue : 4
479 Time Service End : 86
480 Time Customer Spends in System : 9
481 Idle Time of Server : 0
482 Random Digit for Service Time : 93
483 Random Digit for Arrival Time : 29
484 Service Name : ABLE
485 ++++++
486 CID : 38
487 Time Since Last Arrival : 1
488 Arrival Time : 78
489 Service Time : 3
490 Time Server Begins : 84
491 Time Customer waits in Queue : 6
492 Time Service End : 87
493 Time Customer Spends in System : 9
494 Idle Time of Server : 0
495 Random Digit for Service Time : 21
496 Random Digit for Arrival Time : 18
497 Service Name : BACKER
498 ++++++
499 CID : 39
500 Time Since Last Arrival : 3
501 Arrival Time : 81
502 Service Time : 3
503 Time Server Begins : 86
504 Time Customer waits in Queue : 5
505 Time Service End : 89
506 Time Customer Spends in System : 8
507 Idle Time of Server : 0
508 Random Digit for Service Time : 58
509 Random Digit for Arrival Time : 80
510 Service Name : ABLE
511 ++++++
512 CID : 40
513 Time Since Last Arrival : 1
514 Arrival Time : 82
515 Service Time : 4
516 Time Server Begins : 87
517 Time Customer waits in Queue : 5
518 Time Service End : 91
519 Time Customer Spends in System : 9
520 Idle Time of Server : 0
521 Random Digit for Service Time : 58
522 Random Digit for Arrival Time : 10
523 Service Name : BACKER
524 ++++++
525 CID : 41
526 Time Since Last Arrival : 3
527 Arrival Time : 85
528 Service Time : 5
529 Time Server Begins : 89
530 Time Customer waits in Queue : 4
531 Time Service End : 94
```

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532 Time Customer Spends in System : 9
533 Idle Time of Server : 0
534 Random Digit for Service Time : 95
535 Random Digit for Arrival Time : 78
536 Service Name : ABLE
537 ++++++
538 CID : 42
539 Time Since Last Arrival : 2
540 Arrival Time : 87
541 Service Time : 6
542 Time Server Begins : 91
543 Time Customer waits in Queue : 4
544 Time Service End : 97
545 Time Customer Spends in System : 10
546 Idle Time of Server : 0
547 Random Digit for Service Time : 93
548 Random Digit for Arrival Time : 35
549 Service Name : BACKER
550 ++++++
551 CID : 43
552 Time Since Last Arrival : 2
553 Arrival Time : 89
554 Service Time : 2
555 Time Server Begins : 94
556 Time Customer waits in Queue : 5
557 Time Service End : 96
558 Time Customer Spends in System : 7
559 Idle Time of Server : 0
560 Random Digit for Service Time : 23
561 Random Digit for Arrival Time : 40
562 Service Name : ABLE
563 ++++++
564 CID : 44
565 Time Since Last Arrival : 3
566 Arrival Time : 92
567 Service Time : 2
568 Time Server Begins : 96
569 Time Customer waits in Queue : 4
570 Time Service End : 98
571 Time Customer Spends in System : 6
572 Idle Time of Server : 0
573 Random Digit for Service Time : 6
574 Random Digit for Arrival Time : 69
575 Service Name : ABLE
576 ++++++
577 CID : 45
578 Time Since Last Arrival : 2
579 Arrival Time : 94
580 Service Time : 5
581 Time Server Begins : 97
582 Time Customer waits in Queue : 3
583 Time Service End : 102
584 Time Customer Spends in System : 8
585 Idle Time of Server : 0
586 Random Digit for Service Time : 62
587 Random Digit for Arrival Time : 49
588 Service Name : BACKER
589 ++++++
590 CID : 46
```

```
591 Time Since Last Arrival : 3
592 Arrival Time : 97
593 Service Time : 3
594 Time Server Begins : 98
595 Time Customer waits in Queue : 1
596 Time Service End : 101
597 Time Customer Spends in System : 4
598 Idle Time of Server : 0
599 Random Digit for Service Time : 48
600 Random Digit for Arrival Time : 76
601 Service Name : ABLE
602 ++++++
603 CID : 47
604 Time Since Last Arrival : 2
605 Arrival Time : 99
606 Service Time : 2
607 Time Server Begins : 101
608 Time Customer waits in Queue : 2
609 Time Service End : 103
610 Time Customer Spends in System : 4
611 Idle Time of Server : 0
612 Random Digit for Service Time : 8
613 Random Digit for Arrival Time : 52
614 Service Name : ABLE
615 ++++++
616 CID : 48
617 Time Since Last Arrival : 1
618 Arrival Time : 100
619 Service Time : 6
620 Time Server Begins : 102
621 Time Customer waits in Queue : 2
622 Time Service End : 108
623 Time Customer Spends in System : 8
624 Idle Time of Server : 0
625 Random Digit for Service Time : 82
626 Random Digit for Arrival Time : 3
627 Service Name : BACKER
628 ++++++
629 CID : 49
630 Time Since Last Arrival : 2
631 Arrival Time : 102
632 Service Time : 2
633 Time Server Begins : 103
634 Time Customer waits in Queue : 1
635 Time Service End : 105
636 Time Customer Spends in System : 3
637 Idle Time of Server : 0
638 Random Digit for Service Time : 15
639 Random Digit for Arrival Time : 46
640 Service Name : ABLE
641 ++++++
642 CID : 50
643 Time Since Last Arrival : 2
644 Arrival Time : 104
645 Service Time : 2
646 Time Server Begins : 105
647 Time Customer waits in Queue : 1
648 Time Service End : 107
649 Time Customer Spends in System : 3
```

```
650 Idle Time of Server : 0
651 Random Digit for Service Time : 25
652 Random Digit for Arrival Time : 53
653 Service Name : ABLE
654 ++++++
655 CID : 51
656 Time Since Last Arrival : 4
657 Arrival Time : 108
658 Service Time : 2
659 Time Server Begins : 108
660 Time Customer waits in Queue : 0
661 Time Service End : 110
662 Time Customer Spends in System : 2
663 Idle Time of Server : 1
664 Random Digit for Service Time : 13
665 Random Digit for Arrival Time : 87
666 Service Name : ABLE
667 ++++++
668 CID : 52
669 Time Since Last Arrival : 1
670 Arrival Time : 109
671 Service Time : 4
672 Time Server Begins : 109
673 Time Customer waits in Queue : 0
674 Time Service End : 113
675 Time Customer Spends in System : 4
676 Idle Time of Server : 1
677 Random Digit for Service Time : 36
678 Random Digit for Arrival Time : 3
679 Service Name : BACKER
680 ++++++
681 CID : 53
682 Time Since Last Arrival : 1
683 Arrival Time : 110
684 Service Time : 5
685 Time Server Begins : 110
686 Time Customer waits in Queue : 0
687 Time Service End : 115
688 Time Customer Spends in System : 5
689 Idle Time of Server : 0
690 Random Digit for Service Time : 93
691 Random Digit for Arrival Time : 15
692 Service Name : ABLE
693 ++++++
694 CID : 54
695 Time Since Last Arrival : 3
696 Arrival Time : 113
697 Service Time : 3
698 Time Server Begins : 113
699 Time Customer waits in Queue : 0
700 Time Service End : 116
701 Time Customer Spends in System : 3
702 Idle Time of Server : 0
703 Random Digit for Service Time : 11
704 Random Digit for Arrival Time : 84
705 Service Name : BACKER
706 ++++++
707 CID : 55
708 Time Since Last Arrival : 4
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```
709 Arrival Time : 117
710 Service Time : 3
711 Time Server Begins : 117
712 Time Customer waits in Queue : 0
713 Time Service End : 120
714 Time Customer Spends in System : 3
715 Idle Time of Server : 2
716 Random Digit for Service Time : 46
717 Random Digit for Arrival Time : 88
718 Service Name : ABLE
719 ++++++
720 CID : 56
721 Time Since Last Arrival : 4
722 Arrival Time : 121
723 Service Time : 5
724 Time Server Begins : 121
725 Time Customer waits in Queue : 0
726 Time Service End : 126
727 Time Customer Spends in System : 5
728 Idle Time of Server : 1
729 Random Digit for Service Time : 92
730 Random Digit for Arrival Time : 91
731 Service Name : ABLE
732 ++++++
733 CID : 57
734 Time Since Last Arrival : 1
735 Arrival Time : 122
736 Service Time : 3
737 Time Server Begins : 122
738 Time Customer waits in Queue : 0
739 Time Service End : 125
740 Time Customer Spends in System : 3
741 Idle Time of Server : 6
742 Random Digit for Service Time : 28
743 Random Digit for Arrival Time : 5
744 Service Name : BACKER
745 ++++++
746 CID : 58
747 Time Since Last Arrival : 1
748 Arrival Time : 123
749 Service Time : 6
750 Time Server Begins : 125
751 Time Customer waits in Queue : 2
752 Time Service End : 131
753 Time Customer Spends in System : 8
754 Idle Time of Server : 0
755 Random Digit for Service Time : 96
756 Random Digit for Arrival Time : 20
757 Service Name : BACKER
758 ++++++
759 CID : 59
760 Time Since Last Arrival : 1
761 Arrival Time : 124
762 Service Time : 4
763 Time Server Begins : 126
764 Time Customer waits in Queue : 2
765 Time Service End : 130
766 Time Customer Spends in System : 6
767 Idle Time of Server : 0
```

```
768 Random Digit for Service Time : 72
769 Random Digit for Arrival Time : 24
770 Service Name : ABLE
771 ++++++
772 CID : 60
773 Time Since Last Arrival : 4
774 Arrival Time : 128
775 Service Time : 5
776 Time Server Begins : 130
777 Time Customer waits in Queue : 2
778 Time Service End : 135
779 Time Customer Spends in System : 7
780 Idle Time of Server : 0
781 Random Digit for Service Time : 96
782 Random Digit for Arrival Time : 90
783 Service Name : ABLE
784 ++++++
785 CID : 61
786 Time Since Last Arrival : 2
787 Arrival Time : 130
788 Service Time : 3
789 Time Server Begins : 131
790 Time Customer waits in Queue : 1
791 Time Service End : 134
792 Time Customer Spends in System : 4
793 Idle Time of Server : 0
794 Random Digit for Service Time : 32
795 Random Digit for Arrival Time : 47
796 Service Name : BACKER
797 ++++++
798 CID : 62
799 Time Since Last Arrival : 3
800 Arrival Time : 133
801 Service Time : 5
802 Time Server Begins : 134
803 Time Customer waits in Queue : 1
804 Time Service End : 139
805 Time Customer Spends in System : 6
806 Idle Time of Server : 0
807 Random Digit for Service Time : 71
808 Random Digit for Arrival Time : 78
809 Service Name : BACKER
810 ++++++
811 CID : 63
812 Time Since Last Arrival : 2
813 Arrival Time : 135
814 Service Time : 5
815 Time Server Begins : 135
816 Time Customer waits in Queue : 0
817 Time Service End : 140
818 Time Customer Spends in System : 5
819 Idle Time of Server : 0
820 Random Digit for Service Time : 86
821 Random Digit for Arrival Time : 59
822 Service Name : ABLE
823 ++++++
824 CID : 64
825 Time Since Last Arrival : 2
826 Arrival Time : 137
```

```
827 Service Time : 5
828 Time Server Begins : 139
829 Time Customer waits in Queue : 2
830 Time Service End : 144
831 Time Customer Spends in System : 7
832 Idle Time of Server : 0
833 Random Digit for Service Time : 72
834 Random Digit for Arrival Time : 63
835 Service Name : BACKER
836 ++++++
837 CID : 65
838 Time Since Last Arrival : 1
839 Arrival Time : 138
840 Service Time : 2
841 Time Server Begins : 140
842 Time Customer waits in Queue : 2
843 Time Service End : 142
844 Time Customer Spends in System : 4
845 Idle Time of Server : 0
846 Random Digit for Service Time : 20
847 Random Digit for Arrival Time : 23
848 Service Name : ABLE
849 ++++++
850 CID : 66
851 Time Since Last Arrival : 2
852 Arrival Time : 140
853 Service Time : 2
854 Time Server Begins : 142
855 Time Customer waits in Queue : 2
856 Time Service End : 144
857 Time Customer Spends in System : 4
858 Idle Time of Server : 0
859 Random Digit for Service Time : 4
860 Random Digit for Arrival Time : 42
861 Service Name : ABLE
862 ++++++
863 CID : 67
864 Time Since Last Arrival : 2
865 Arrival Time : 142
866 Service Time : 3
867 Time Server Begins : 144
868 Time Customer waits in Queue : 2
869 Time Service End : 147
870 Time Customer Spends in System : 5
871 Idle Time of Server : 0
872 Random Digit for Service Time : 48
873 Random Digit for Arrival Time : 29
874 Service Name : ABLE
875 ++++++
876 CID : 68
877 Time Since Last Arrival : 2
878 Arrival Time : 144
879 Service Time : 3
880 Time Server Begins : 144
881 Time Customer waits in Queue : 0
882 Time Service End : 147
883 Time Customer Spends in System : 3
884 Idle Time of Server : 0
885 Random Digit for Service Time : 29
```

```
886 Random Digit for Arrival Time : 43
887 Service Name : BACKER
888 ++++++
889 CID : 69
890 Time Since Last Arrival : 3
891 Arrival Time : 147
892 Service Time : 5
893 Time Server Begins : 147
894 Time Customer waits in Queue : 0
895 Time Service End : 152
896 Time Customer Spends in System : 5
897 Idle Time of Server : 0
898 Random Digit for Service Time : 92
899 Random Digit for Arrival Time : 77
900 Service Name : ABLE
901 ++++++
902 CID : 70
903 Time Since Last Arrival : 3
904 Arrival Time : 150
905 Service Time : 5
906 Time Server Begins : 150
907 Time Customer waits in Queue : 0
908 Time Service End : 155
909 Time Customer Spends in System : 5
910 Idle Time of Server : 3
911 Random Digit for Service Time : 76
912 Random Digit for Arrival Time : 79
913 Service Name : BACKER
914 ++++++
915 CID : 71
916 Time Since Last Arrival : 1
917 Arrival Time : 151
918 Service Time : 5
919 Time Server Begins : 152
920 Time Customer waits in Queue : 1
921 Time Service End : 157
922 Time Customer Spends in System : 6
923 Idle Time of Server : 0
924 Random Digit for Service Time : 98
925 Random Digit for Arrival Time : 16
926 Service Name : ABLE
927 ++++++
928 CID : 72
929 Time Since Last Arrival : 2
930 Arrival Time : 153
931 Service Time : 6
932 Time Server Begins : 155
933 Time Customer waits in Queue : 2
934 Time Service End : 161
935 Time Customer Spends in System : 8
936 Idle Time of Server : 0
937 Random Digit for Service Time : 87
938 Random Digit for Arrival Time : 48
939 Service Name : BACKER
940 ++++++
941 CID : 73
942 Time Since Last Arrival : 1
943 Arrival Time : 154
944 Service Time : 2
```



```
945 Time Server Begins : 157
946 Time Customer waits in Queue : 3
947 Time Service End : 159
948 Time Customer Spends in System : 5
949 Idle Time of Server : 0
950 Random Digit for Service Time : 18
951 Random Digit for Arrival Time : 9
952 Service Name : ABLE
953 ++++++
954 CID : 74
955 Time Since Last Arrival : 2
956 Arrival Time : 156
957 Service Time : 5
958 Time Server Begins : 159
959 Time Customer waits in Queue : 3
960 Time Service End : 164
961 Time Customer Spends in System : 8
962 Idle Time of Server : 0
963 Random Digit for Service Time : 85
964 Random Digit for Arrival Time : 41
965 Service Name : ABLE
966 ++++++
967 CID : 75
968 Time Since Last Arrival : 3
969 Arrival Time : 159
970 Service Time : 3
971 Time Server Begins : 161
972 Time Customer waits in Queue : 2
973 Time Service End : 164
974 Time Customer Spends in System : 5
975 Idle Time of Server : 0
976 Random Digit for Service Time : 23
977 Random Digit for Arrival Time : 72
978 Service Name : BACKER
979 ++++++
980 CID : 76
981 Time Since Last Arrival : 3
982 Arrival Time : 162
983 Service Time : 5
984 Time Server Begins : 164
985 Time Customer waits in Queue : 2
986 Time Service End : 169
987 Time Customer Spends in System : 7
988 Idle Time of Server : 0
989 Random Digit for Service Time : 85
990 Random Digit for Arrival Time : 68
991 Service Name : ABLE
992 ++++++
993 CID : 77
994 Time Since Last Arrival : 2
995 Arrival Time : 164
996 Service Time : 5
997 Time Server Begins : 164
998 Time Customer waits in Queue : 0
999 Time Service End : 169
1000 Time Customer Spends in System : 5
1001 Idle Time of Server : 0
1002 Random Digit for Service Time : 65
1003 Random Digit for Arrival Time : 41
```

```
1004 Service Name : BACKER
1005 ++++++
1006 CID : 78
1007 Time Since Last Arrival : 1
1008 Arrival Time : 165
1009 Service Time : 2
1010 Time Server Begins : 169
1011 Time Customer waits in Queue : 4
1012 Time Service End : 171
1013 Time Customer Spends in System : 6
1014 Idle Time of Server : 0
1015 Random Digit for Service Time : 29
1016 Random Digit for Arrival Time : 22
1017 Service Name : ABLE
1018 ++++++
1019 CID : 79
1020 Time Since Last Arrival : 3
1021 Arrival Time : 168
1022 Service Time : 4
1023 Time Server Begins : 169
1024 Time Customer waits in Queue : 1
1025 Time Service End : 173
1026 Time Customer Spends in System : 5
1027 Idle Time of Server : 0
1028 Random Digit for Service Time : 60
1029 Random Digit for Arrival Time : 70
1030 Service Name : BACKER
1031 ++++++
1032 CID : 80
1033 Time Since Last Arrival : 3
1034 Arrival Time : 171
1035 Service Time : 2
1036 Time Server Begins : 171
1037 Time Customer waits in Queue : 0
1038 Time Service End : 173
1039 Time Customer Spends in System : 2
1040 Idle Time of Server : 0
1041 Random Digit for Service Time : 26
1042 Random Digit for Arrival Time : 69
1043 Service Name : ABLE
1044 ++++++
1045 CID : 81
1046 Time Since Last Arrival : 1
1047 Arrival Time : 172
1048 Service Time : 2
1049 Time Server Begins : 173
1050 Time Customer waits in Queue : 1
1051 Time Service End : 175
1052 Time Customer Spends in System : 3
1053 Idle Time of Server : 0
1054 Random Digit for Service Time : 23
1055 Random Digit for Arrival Time : 17
1056 Service Name : ABLE
1057 ++++++
1058 CID : 82
1059 Time Since Last Arrival : 2
1060 Arrival Time : 174
1061 Service Time : 4
1062 Time Server Begins : 174
```

```
1063 Time Customer waits in Queue : 0
1064 Time Service End : 178
1065 Time Customer Spends in System : 4
1066 Idle Time of Server : 1
1067 Random Digit for Service Time : 39
1068 Random Digit for Arrival Time : 34
1069 Service Name : BACKER
1070 ++++++
1071 CID : 83
1072 Time Since Last Arrival : 4
1073 Arrival Time : 178
1074 Service Time : 3
1075 Time Server Begins : 178
1076 Time Customer waits in Queue : 0
1077 Time Service End : 181
1078 Time Customer Spends in System : 3
1079 Idle Time of Server : 3
1080 Random Digit for Service Time : 36
1081 Random Digit for Arrival Time : 90
1082 Service Name : ABLE
1083 ++++++
1084 CID : 84
1085 Time Since Last Arrival : 3
1086 Arrival Time : 181
1087 Service Time : 5
1088 Time Server Begins : 181
1089 Time Customer waits in Queue : 0
1090 Time Service End : 186
1091 Time Customer Spends in System : 5
1092 Idle Time of Server : 0
1093 Random Digit for Service Time : 90
1094 Random Digit for Arrival Time : 70
1095 Service Name : ABLE
1096 ++++++
1097 CID : 85
1098 Time Since Last Arrival : 2
1099 Arrival Time : 183
1100 Service Time : 5
1101 Time Server Begins : 183
1102 Time Customer waits in Queue : 0
1103 Time Service End : 188
1104 Time Customer Spends in System : 5
1105 Idle Time of Server : 5
1106 Random Digit for Service Time : 73
1107 Random Digit for Arrival Time : 48
1108 Service Name : BACKER
1109 ++++++
1110 CID : 86
1111 Time Since Last Arrival : 1
1112 Arrival Time : 184
1113 Service Time : 3
1114 Time Server Begins : 186
1115 Time Customer waits in Queue : 2
1116 Time Service End : 189
1117 Time Customer Spends in System : 5
1118 Idle Time of Server : 0
1119 Random Digit for Service Time : 52
1120 Random Digit for Arrival Time : 6
1121 Service Name : ABLE
```

```
1122 ++++++
1123 CID : 87
1124 Time Since Last Arrival : 1
1125 Arrival Time : 185
1126 Service Time : 3
1127 Time Server Begins : 188
1128 Time Customer waits in Queue : 3
1129 Time Service End : 191
1130 Time Customer Spends in System : 6
1131 Idle Time of Server : 0
1132 Random Digit for Service Time : 11
1133 Random Digit for Arrival Time : 20
1134 Service Name : BACKER
1135 ++++++
1136 CID : 88
1137 Time Since Last Arrival : 4
1138 Arrival Time : 189
1139 Service Time : 5
1140 Time Server Begins : 189
1141 Time Customer waits in Queue : 0
1142 Time Service End : 194
1143 Time Customer Spends in System : 5
1144 Idle Time of Server : 0
1145 Random Digit for Service Time : 90
1146 Random Digit for Arrival Time : 96
1147 Service Name : ABLE
1148 ++++++
1149 CID : 89
1150 Time Since Last Arrival : 1
1151 Arrival Time : 190
1152 Service Time : 4
1153 Time Server Begins : 191
1154 Time Customer waits in Queue : 1
1155 Time Service End : 195
1156 Time Customer Spends in System : 5
1157 Idle Time of Server : 0
1158 Random Digit for Service Time : 41
1159 Random Digit for Arrival Time : 4
1160 Service Name : BACKER
1161 ++++++
1162 CID : 90
1163 Time Since Last Arrival : 2
1164 Arrival Time : 192
1165 Service Time : 5
1166 Time Server Begins : 194
1167 Time Customer waits in Queue : 2
1168 Time Service End : 199
1169 Time Customer Spends in System : 7
1170 Idle Time of Server : 0
1171 Random Digit for Service Time : 97
1172 Random Digit for Arrival Time : 37
1173 Service Name : ABLE
1174 ++++++
1175 CID : 91
1176 Time Since Last Arrival : 2
1177 Arrival Time : 194
1178 Service Time : 3
1179 Time Server Begins : 195
1180 Time Customer waits in Queue : 1
```

```
1181 Time Service End : 198
1182 Time Customer Spends in System : 4
1183 Idle Time of Server : 0
1184 Random Digit for Service Time : 23
1185 Random Digit for Arrival Time : 61
1186 Service Name : BACKER
1187 ++++++
1188 CID : 92
1189 Time Since Last Arrival : 1
1190 Arrival Time : 195
1191 Service Time : 4
1192 Time Server Begins : 198
1193 Time Customer waits in Queue : 3
1194 Time Service End : 202
1195 Time Customer Spends in System : 7
1196 Idle Time of Server : 0
1197 Random Digit for Service Time : 53
1198 Random Digit for Arrival Time : 4
1199 Service Name : BACKER
1200 ++++++
1201 CID : 93
1202 Time Since Last Arrival : 1
1203 Arrival Time : 196
1204 Service Time : 2
1205 Time Server Begins : 199
1206 Time Customer waits in Queue : 3
1207 Time Service End : 201
1208 Time Customer Spends in System : 5
1209 Idle Time of Server : 0
1210 Random Digit for Service Time : 28
1211 Random Digit for Arrival Time : 5
1212 Service Name : ABLE
1213 ++++++
1214 CID : 94
1215 Time Since Last Arrival : 1
1216 Arrival Time : 197
1217 Service Time : 2
1218 Time Server Begins : 201
1219 Time Customer waits in Queue : 4
1220 Time Service End : 203
1221 Time Customer Spends in System : 6
1222 Idle Time of Server : 0
1223 Random Digit for Service Time : 17
1224 Random Digit for Arrival Time : 22
1225 Service Name : ABLE
1226 ++++++
1227 CID : 95
1228 Time Since Last Arrival : 1
1229 Arrival Time : 198
1230 Service Time : 6
1231 Time Server Begins : 202
1232 Time Customer waits in Queue : 4
1233 Time Service End : 208
1234 Time Customer Spends in System : 10
1235 Idle Time of Server : 0
1236 Random Digit for Service Time : 91
1237 Random Digit for Arrival Time : 20
1238 Service Name : BACKER
1239 ++++++
```

```
1240 CID : 96
1241 Time Since Last Arrival : 1
1242 Arrival Time : 199
1243 Service Time : 4
1244 Time Server Begins : 203
1245 Time Customer waits in Queue : 4
1246 Time Service End : 207
1247 Time Customer Spends in System : 8
1248 Idle Time of Server : 0
1249 Random Digit for Service Time : 80
1250 Random Digit for Arrival Time : 16
1251 Service Name : ABLE
1252 ++++++
1253 CID : 97
1254 Time Since Last Arrival : 2
1255 Arrival Time : 201
1256 Service Time : 4
1257 Time Server Begins : 207
1258 Time Customer waits in Queue : 6
1259 Time Service End : 211
1260 Time Customer Spends in System : 10
1261 Idle Time of Server : 0
1262 Random Digit for Service Time : 74
1263 Random Digit for Arrival Time : 47
1264 Service Name : ABLE
1265 ++++++
1266 CID : 98
1267 Time Since Last Arrival : 1
1268 Arrival Time : 202
1269 Service Time : 3
1270 Time Server Begins : 208
1271 Time Customer waits in Queue : 6
1272 Time Service End : 211
1273 Time Customer Spends in System : 9
1274 Idle Time of Server : 0
1275 Random Digit for Service Time : 33
1276 Random Digit for Arrival Time : 12
1277 Service Name : BACKER
1278 ++++++
1279 CID : 99
1280 Time Since Last Arrival : 1
1281 Arrival Time : 203
1282 Service Time : 5
1283 Time Server Begins : 211
1284 Time Customer waits in Queue : 8
1285 Time Service End : 216
1286 Time Customer Spends in System : 13
1287 Idle Time of Server : 0
1288 Random Digit for Service Time : 95
1289 Random Digit for Arrival Time : 24
1290 Service Name : ABLE
1291 ++++++
1292 CID : 100
1293 Time Since Last Arrival : 3
1294 Arrival Time : 206
1295 Service Time : 5
1296 Time Server Begins : 211
1297 Time Customer waits in Queue : 5
1298 Time Service End : 216
```

```
1299 Time Customer Spends in System : 10
1300 Idle Time of Server : 0
1301 Random Digit for Service Time : 80
1302 Random Digit for Arrival Time : 77
1303 Service Name : BACKER
1304 ++++++
1305 ABLE CALCULATIONS :
1306 ABLE average waiting time for a customer : 1.9298245614035088
1307 ABLE probably that a customer has to wait in queue : 0.684210526315
1308 ABLE fraction of idle time of the server : 0.05555555555555555
1309 ABLE probably of the server being busy : 0.9444444444444444
1310 ABLE average service time : 3.5789473684210527
1311 ABLE expected value : 3.29
1312 ABLE average time between arrivals : 3.625
1313 ABLE discrete uniform distribution : 2.5
1314 ABLE average waiting time of those who wait : 2.8205128205128207
1315 ABLE average time a customer spends in the system : 5.508771929824
1316 ABLE average time customer spends in the system : 5.5087719298245
1317 The able customer : 57
1318 The backer customer : 43
1319 ++++++
1320 BACKER CALCULATIONS :
1321 BACKER average waiting time for a customer : 1.813953488372093
1322 BACKER probably that a customer has to wait in queue : 0.697674418
1323 BACKER fraction of idle time of the server : 0.125
1324 BACKER probably of the server being busy : 0.875
1325 BACKER average service time : 4.372093023255814
1326 BACKER expected value : 4.25
1327 BACKER average time between arrivals : 4.904761904761905
1328 BACKER discrete uniform distribution : 2.5
1329 BACKER average waiting time of those who wait : 2.6
1330 BACKER average time a customer spends in the system : 6.186046511
1331 BACKER average time customer spends in the system : 6.18604651162
1332 The able customer : 57
1333 The backer customer : 43
1334 Excel written successfully..
1335
1336 Process finished with exit code 0
1337
```