

Chlorpromazine Testing

The reactions times of a schizophrenic patient were tested over a period of 60 consecutive days.

The patient was then put on a course of Chlorpromazine and tested again for the following consecutive 60 days.

Reaction time was for a finger twitch after a visual flash. (It is a well-known proxy for alertness, using both visual and physical body systems.)

The reaction times are given to the right, with the summary statistics, in groups of both 60 and 30 days.

1. Write a question you might be able to answer with the data.
2. Calculate the confidence intervals for the data.
3. Select an appropriate type of graph and draw it.
4. What other sort of graphs or data analysis might be useful?
5. Analyse the data, including using your graph(s) and statistics.
6. Answer your question.

Day 1	55	Day 31	35	Day 61	66	Day 91	27
Day 2	56	Day 32	79	Day 62	73	Day 92	26
Day 3	48	Day 33	71	Day 63	62	Day 93	29
Day 4	46	Day 34	73	Day 64	27	Day 94	31
Day 5	56	Day 35	77	Day 65	52	Day 95	28
Day 6	46	Day 36	76	Day 66	47	Day 96	38
Day 7	59	Day 37	83	Day 67	65	Day 97	37
Day 8	60	Day 38	73	Day 68	59	Day 98	26
Day 9	53	Day 39	78	Day 69	77	Day 99	31
Day 10	58	Day 40	91	Day 70	47	Day 100	45
Day 11	73	Day 41	70	Day 71	51	Day 101	38
Day 12	69	Day 42	88	Day 72	47	Day 102	33
Day 13	72	Day 43	88	Day 73	49	Day 103	33
Day 14	51	Day 44	85	Day 74	54	Day 104	25
Day 15	72	Day 45	77	Day 75	58	Day 105	24
Day 16	69	Day 46	63	Day 76	56	Day 106	29
Day 17	68	Day 47	91	Day 77	50	Day 107	37
Day 18	69	Day 48	94	Day 78	54	Day 108	35
Day 19	79	Day 49	72	Day 79	45	Day 109	32
Day 20	77	Day 50	83	Day 80	66	Day 110	31
Day 21	53	Day 51	88	Day 81	39	Day 111	28
Day 22	63	Day 52	78	Day 82	51	Day 112	40
Day 23	80	Day 53	84	Day 83	39	Day 113	31
Day 24	65	Day 54	78	Day 84	27	Day 114	37
Day 25	78	Day 55	75	Day 85	39	Day 115	34
Day 26	64	Day 56	75	Day 86	37	Day 116	43
Day 27	72	Day 57	86	Day 87	43	Day 117	38
Day 28	77	Day 58	79	Day 88	41	Day 118	33
Day 29	82	Day 59	76	Day 89	27	Day 119	28
Day 30	77	Day 60	87	Day 90	29	Day 120	35

Days	1-60	1-30	31-60	61-120	61-90	91-120
mean	71.67	64.90	78.43	40.98	49.23	32.73
highest	94	82	94	77	77	45
UQ	79	72.75	85.75	49.25	57.5	37
median	74	66.5	78	38	49.5	32.5
LQ	63.75	56	75	31	39.5	28.25
lowest	35	46	35	24	27	24