

```
Data :=
(
21.0367 73729
21.0439 135849
21.0461 101934
21.0600 109913
21.0706 108092
21.0744 10613
21.0789 165613
21.0906 47475
21.1156 4056
21.1261 47021
21.1294 100001
21.1450 147416
21.1494 70726
21.1622 104744
21.1667 23026
21.2183 77577
)
```

X := Data^{<1>} Y := Data^{<2>}

Sample_{tail_1} := submatrix(Y, 1, 8, 1, 1)

Sample_{tail_2} := submatrix(Y, 9, 16, 1, 1)

► Logarithm of the data

Sample size:

N := rows(Y)

N = 16

Mean;

Mean := mean(Y)

Mean = 82986.563

$$\frac{\sum_{i=1}^N Y_i}{N} = 82986.563$$

mean(Sample_{tail_1}) = 94152.25

mean(Sample_{tail_2}) = 71820.875

Sample standart deviation:

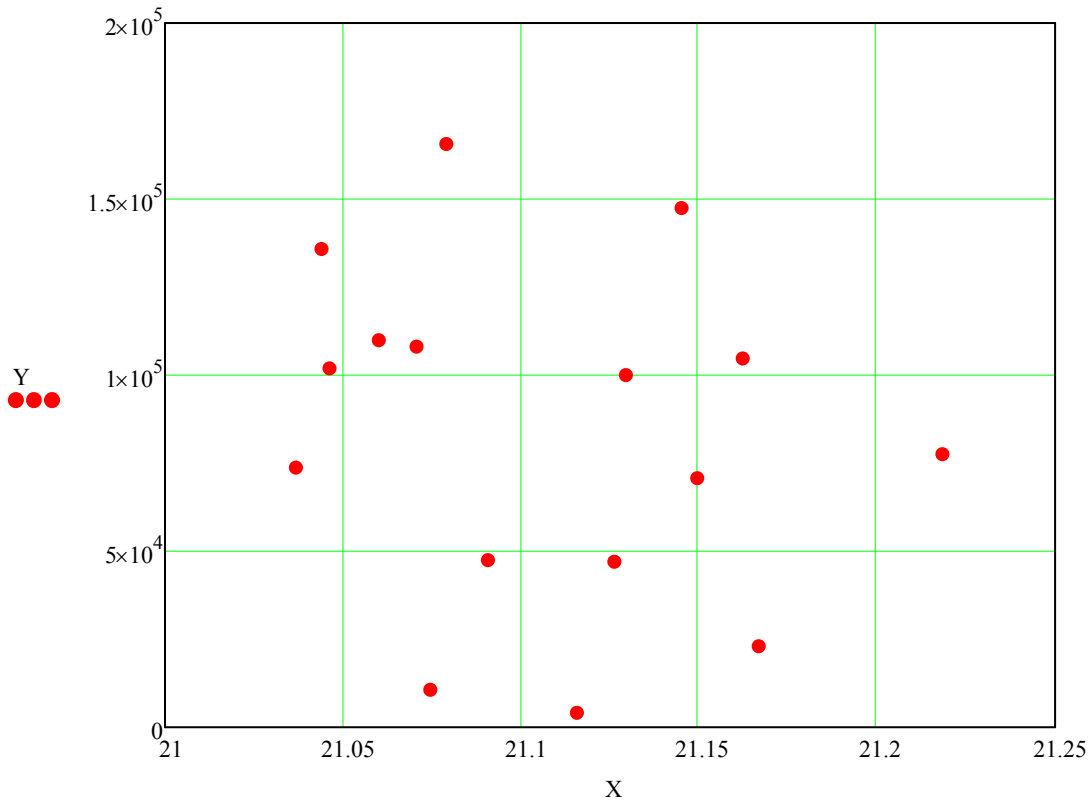
Standart_deviation := Stdev(Y)

Standart_deviation = 47702.573

$$\sqrt{\frac{\sum_{i=1}^N \left(Y_i - \frac{\sum_{i=1}^N Y_i}{N} \right)^2}{N - 1}} = 47702.573$$

Stdev(Sample_{tail_1}) = 49169.114

Stdev(Sample_{tail_2}) = 46621.666



$$\text{guess} := \begin{pmatrix} 1 \\ 1 \end{pmatrix}$$

$$f(x, D) := \text{dnorm}(x, D_1, D_2)^{-1}$$

$$D := \text{genfit}(X, Y, \text{guess}, f)$$

$$F(x) := f(x, D)$$

$$x := 21, 21.001 .. 21.3$$

