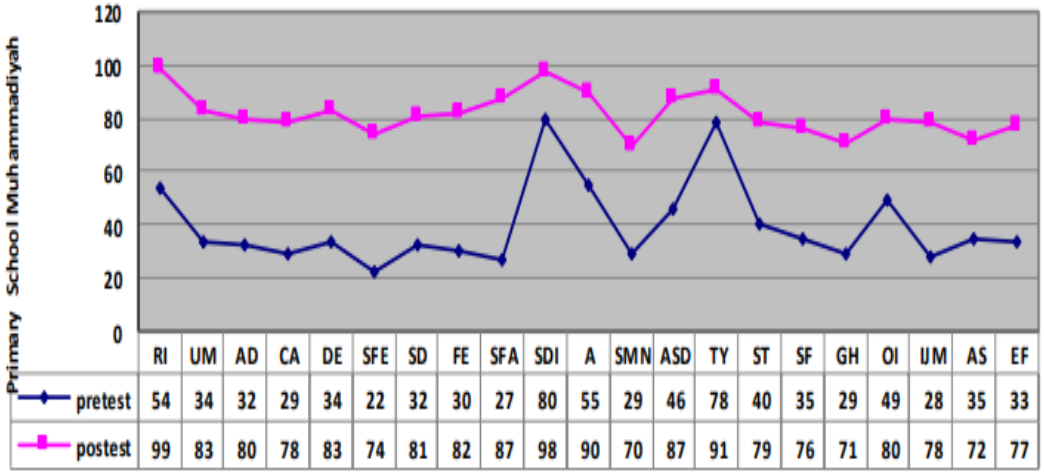
KELOMPOK 1

Anggota Kelompok :

1. Thoriq Affanudin (1900006105)
2. Rita Fitrianingsih (1900006112)
3. Aldino Rizqi Hadi Sofyan (1911006057)
4. Fenti Ria Ananda (1911006059)

Analisis Artikel Bulkani dkk dengan judul *"Development of Animation Learning Media Based on Local Wisdom to Improve Student Learning Outcomes in Elementary Schools"*

1. Uji Visualisasi Data
   Diketahui bahwa nilai postest dan pretest SD Muhammdiyah kelas IV A sebagai berikut, setelah kita uji menggunakan program R dapat dibuktikan bahwa data yang diperolejh dalam penetian ini valid



	RI	UM	AD	CA	DE	SFE	SD	FE	SFA	SDI	A	SMN	ASD	TY	ST	SF	GH	OI	IJM	AS	EF
pretest	54	34	32	29	34	22	32	30	27	80	55	29	46	78	40	35	29	49	28	35	33
postest	99	83	80	78	83	74	81	82	87	98	90	70	87	91	79	76	71	80	78	72	77

Uji program R

RStudio

File Edit Code View Plots Session Build Debug Profile Tools Help

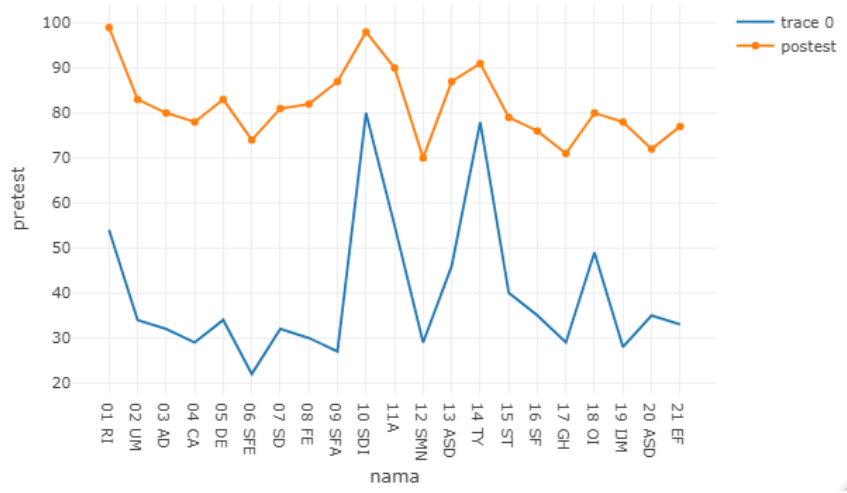
Go to file/function | Addins

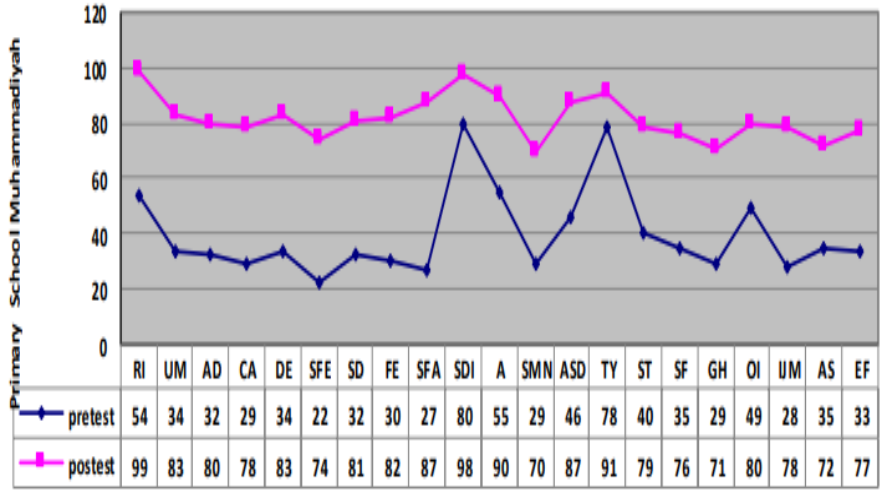
nilai.R | KELAS4A.R*

Source on Save | Run

```
1  setwd('D:/Kuliah/semester 7/Kompstat/TugasAKHIR')
2  data_iva<-read.csv('iva.csv')
3  data_iva
4  pretest=data_iva$pretest
5  postest=data_iva$postest
6  nama=data_iva$nama
7
8  library(plotly)
9
10 data <- data.frame(nama, pretest)
11
12 fig <- plot_ly(data, x=~nama, y=~pretest, type='scatter', mode='line')
13 fig <- fig %>% add_trace(y=~postest, name='postest', mode='lines+markers')
14 fig
```

Perbadingan grafik scatter dengan grafik dala, penelitian ini





	RI	UM	AD	CA	DE	SFE	SD	FE	SFA	SDI	A	SMN	ASD	TY	ST	SF	GH	OI	IJM	AS	EF
pretest	54	34	32	29	34	22	32	30	27	80	55	29	46	78	40	35	29	49	28	35	33
postest	99	83	80	78	83	74	81	82	87	98	90	70	87	91	79	76	71	80	78	72	77

2. Uji Statistik

```
Untitled1*
Source on Save | Run | Source
1  data1 <- read.csv('iva_muhi.csv')
2  data2 <- read.csv('ivb_muhi.csv')
3  data3 <- read.csv('iva_panandut.csv')
4  data4 <- read.csv('ivb_panandut.csv')
5  data5 <- read.csv('iva_panarung.csv')
6  data6 <- read.csv('ivb_panarung.csv')
7
8  pretest <- c(data1$pretest, data2$pretest, data3$pretest, data4$pret
9  postest <- c(data1$postest, data2$postest, data3$postest, data4$post
10
11 summary(pretest)
12 summary(postest)
13
14 library(nortest)
15
16 lillie.test(pretest)
17 lillie.test(postest)
18
19 t.test(pretest, postest, mu=0)
20
```

a. Hasil Uji Statistik Deskritif

```
> summary(pretest)
   Min. 1st Qu.  Median    Mean 3rd Qu.    Max.
  18.00   34.00   47.50   48.79   64.00   81.00
> summary(postest)
   Min. 1st Qu.  Median    Mean 3rd Qu.    Max.
  63.00   77.25   81.00   81.60   87.00   99.00
>
```

b. Hasil Uji Normalitas

```
> library(nortest)
> lillie.test(pretest)

        Lilliefors (Kolmogorov-Smirnov) normality test

data:  pretest
D = 0.15857, p-value = 0.0005156

> lillie.test(postest)

        Lilliefors (Kolmogorov-Smirnov) normality test

data:  postest
D = 0.092315, p-value = 0.2109
```

c. Hasil Uji T-Test

```
> t.test(pretest, postest, mu=0)

        Welch Two Sample t-test

data:  pretest and postest
t = -13.248, df = 93.205, p-value < 2.2e-16
alternative hypothesis: true difference in means is not equal to 0
95 percent confidence interval:
 -37.72393 -27.88897
sample estimates:
mean of x mean of y
 48.79032  81.59677
```