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In [2]: import pandas as pd
import numpy as np
import seaborn as sb

data4 = pd.read_csv(r"C:\Users\Hp\oneminuteman\coursework\Scientific-Computing\kaggle_datasets_assignment\Stude

print(data4.describe())

numeric_data=data4.select_dtypes(include=['number'])
print(numeric_data.corr())
```

	Age	Attendance (%)	Midterm_Score	Final_Score	\
count	5000.000000	4484.000000	5000.000000	5000.000000	
mean	21.048400	75.431409	70.326844	69.640788	
std	1.989786	14.372446	17.213209	17.238744	
min	18.000000	50.010000	40.000000	40.000000	
25%	19.000000	63.265000	55.457500	54.667500	
50%	21.000000	75.725000	70.510000	69.735000	
75%	23.000000	87.472500	84.970000	84.500000	
max	24.000000	100.000000	99.980000	99.980000	

	Assignments_Avg	Quizzes_Avg	Participation_Score	Projects_Score	\
count	4483.000000	5000.000000	5000.000000	5000.000000	
mean	74.798673	74.910728	4.980024	74.924860	
std	14.411799	14.504281	2.890136	14.423415	
min	50.000000	50.030000	0.000000	50.010000	
25%	62.090000	62.490000	2.440000	62.320000	
50%	74.810000	74.695000	4.955000	74.980000	
75%	86.970000	87.630000	7.500000	87.367500	
max	99.980000	99.960000	10.000000	100.000000	

	Total_Score	Study_Hours_per_Week	Stress_Level (1-10)	\
count	5000.000000	5000.000000	5000.000000	
mean	75.121804	17.658860	5.48080	
std	14.399941	7.275864	2.86155	
min	50.020000	5.000000	1.00000	
25%	62.835000	11.400000	3.00000	
50%	75.395000	17.500000	5.00000	
75%	87.652500	24.100000	8.00000	
max	99.990000	30.000000	10.00000	

	Sleep_Hours_per_Night
count	5000.000000
mean	6.488140
std	1.452283
min	4.000000
25%	5.200000
50%	6.500000
75%	7.700000
max	9.000000

	Age	Attendance (%)	Midterm_Score	Final_Score	\
Age	1.000000	0.009514	0.006502	-0.016180	
Attendance (%)	0.009514	1.000000	-0.007588	-0.025424	
Midterm_Score	0.006502	-0.007588	1.000000	0.000841	
Final_Score	-0.016180	-0.025424	0.000841	1.000000	
Assignments_Avg	-0.033268	-0.037872	-0.007364	0.010692	
Quizzes_Avg	0.007839	-0.029042	-0.011235	0.003528	
Participation_Score	-0.014129	-0.029839	-0.000836	0.014494	
Projects_Score	0.002401	-0.013337	0.014015	-0.003148	
Total_Score	0.017413	-0.019524	-0.001225	0.006597	
Study_Hours_per_Week	0.001547	0.016311	0.002456	0.009137	
Stress_Level (1-10)	-0.004474	0.012161	0.020020	-0.000450	
Sleep_Hours_per_Night	-0.005090	-0.036312	-0.003724	-0.014106	

	Assignments_Avg	Quizzes_Avg	Participation_Score	\
Age	-0.033268	0.007839	-0.014129	
Attendance (%)	-0.037872	-0.029042	-0.029839	
Midterm_Score	-0.007364	-0.011235	-0.000836	
Final_Score	0.010692	0.003528	0.014494	
Assignments_Avg	1.000000	0.007264	0.013872	
Quizzes_Avg	0.007264	1.000000	-0.005416	
Participation_Score	0.013872	-0.005416	1.000000	
Projects_Score	0.007013	0.005051	-0.025893	
Total_Score	0.000588	0.013963	-0.034289	
Study_Hours_per_Week	0.023342	0.020306	-0.004495	
Stress_Level (1-10)	0.011542	0.001508	-0.006081	
Sleep_Hours_per_Night	0.018564	0.002286	-0.006416	

	Projects_Score	Total_Score	Study_Hours_per_Week	\
Age	0.002401	0.017413	0.001547	
Attendance (%)	-0.013337	-0.019524	0.016311	
Midterm_Score	0.014015	-0.001225	0.002456	
Final_Score	-0.003148	0.006597	0.009137	
Assignments_Avg	0.007013	0.000588	0.023342	
Quizzes_Avg	0.005051	0.013963	0.020306	
Participation_Score	-0.025893	-0.034289	-0.004495	
Projects_Score	1.000000	-0.018489	0.004134	

Total_Score	-0.018489	1.000000	-0.012744
Study_Hours_per_Week	0.004134	-0.012744	1.000000
Stress_Level (1-10)	-0.015188	0.004217	0.004551
Sleep_Hours_per_Night	-0.003537	0.002037	-0.003365

	Stress_Level (1-10)	Sleep_Hours_per_Night
Age	-0.004474	-0.005090
Attendance (%)	0.012161	-0.036312
Midterm_Score	0.020020	-0.003724
Final_Score	-0.000450	-0.014106
Assignments_Avg	0.011542	0.018564
Quizzes_Avg	0.001508	0.002286
Participation_Score	-0.006081	-0.006416
Projects_Score	-0.015188	-0.003537
Total_Score	0.004217	0.002037
Study_Hours_per_Week	0.004551	-0.003365
Stress_Level (1-10)	1.000000	0.007649
Sleep_Hours_per_Night	0.007649	1.000000