Task 0:

Sharan Bhatia: 50%

Evan: 50%

Task 1:

plot of cmp\_b\_s and cmp\_a\_s. (Red: anomalous Blue: normal)

Chart, line chart

Description automatically generated

Plot of cmp\_b\_d and cmp\_a\_d (Red: anomalous Blue: normal)

Chart, scatter chart

Description automatically generated

|  | **f1\_d** | **f2\_d** | **pr\_d** | **lq\_d** | **cmp\_a\_d** | **cmp\_b\_d** | **cmp\_c\_d** |
| --- | --- | --- | --- | --- | --- | --- | --- |
| **mean** | 6.697496 | 0.000613 | 0.192335 | 0.029739 | 0.004803 | -0.021053 | 0.016147 |
| **std** | 1268.971853 | 0.476984 | 26.702247 | 1.817016 | 0.312059 | 0.263566 | 0.143491 |

Task 2: Independent Gaussian Results:

true positives: 38

false positives: 0

false negatives: 1

true negatives: 19

precision: 1.0

recall: 0.9743589743589743

f1 score: 0.9870129870129869

Task 3: Multivariate Gaussian Results

true positives: 36

false positives: 1

false negatives: 3

true negatives: 18

precision: 0.972972972972973

recall: 0.9230769230769231

f1 score: 0.9473684210526315