Project template

June 9, 2024

1 Figures

There are two wonderful packages in LaTeX to create figures TikZ and PGFPlots. The former can be used to create any kind of vector graphic, the latter focuses on plots. Together they can create almost any kind of figure you need for a paper. Use them. Here, some examples from a recent paper [1]:

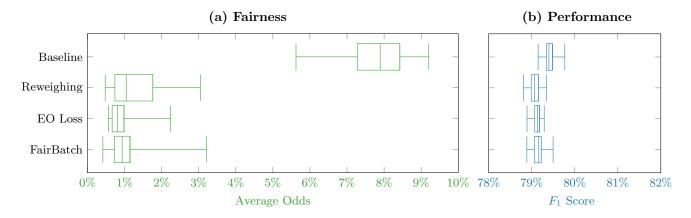


Figure 1: Some box plots

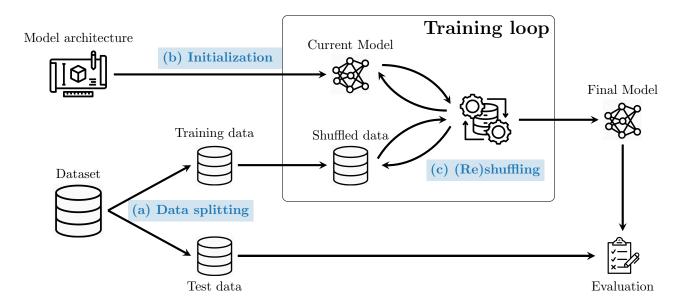


Figure 2: An overview



Figure 3: Some scatterplots

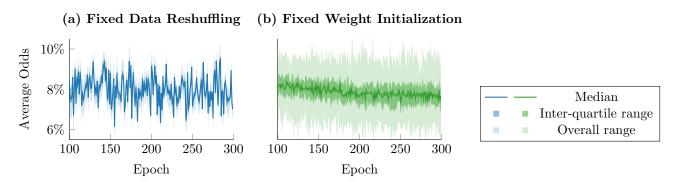


Figure 4: And some line plots with a legend

2 Tables

Use the booktabs package. Ideally only have three horizontal lines. Don't have vertical lines! Generally follow the advise here.

References

[1] P. Ganesh, H. Chang, M. Strobel, and R. Shokri. On the impact of machine learning randomness on group fairness. In *Proceedings of the 2023 ACM Conference on Fairness, Accountability, and Transparency*, pages 1789–1800, 2023.

(a) Different Datasets

Table 1: Some tables

| | Fixed RR | Fixed WI |
|---------------|----------|----------|
| ACSIncome | .94 | .04 |
| ACSEmployment | .89 | .01 |
| CelebA | .92 | .01 |

(b) Different Fairness Metrics

| | Fixed RR | Fixed WI |
|--------------------|----------|----------|
| Average Odds | .94 | .04 |
| Equal Opportunity | .94 | .05 |
| Demographic Parity | .96 | .03 |

(c) Changing Hyperparameters

| | Fixed RR | Fixed WI |
|-------------------------|----------|----------|
| Default Hyperparameters | .94 | .04 |
| Batch Size $= 16$ | .95 | .00 |
| Learning Rate $= 0.01$ | .93 | .00 |
| $Arch = \{2048, 64\}$ | .92 | .00 |
| No Dropout | .94 | .04 |
| Dropout Rate = 10% | .88 | .03 |
| Dropout Rate = 20% | .85 | .04 |
| Dropout Rate = 30% | .80 | .13 |