Error Analysis: resnet50 (Merged) on ExpW
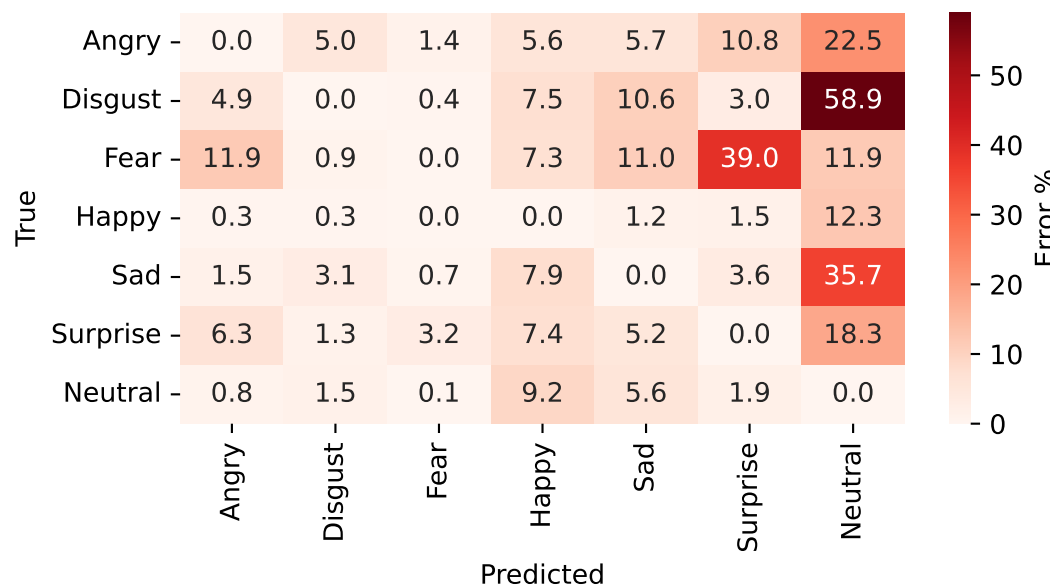
Per-Class Error Rates

Class	Error Rate
Angry	51.0%
Disgust	85.4%
Fear	82.1%
Happy	15.6%
Sad	52.5%
Surprise	41.6%
Neutral	19.2%

Mean: 49.6%
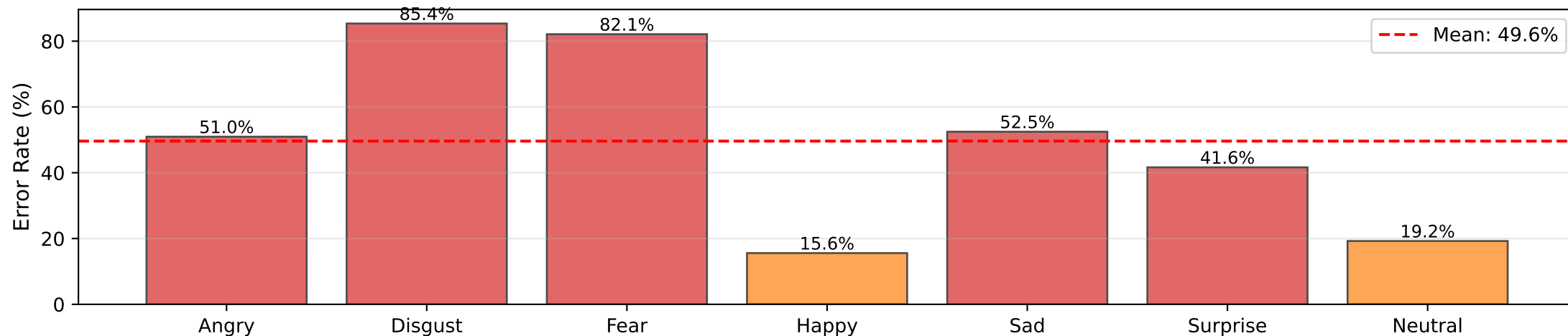
Top 10 Most Confused Class Pairs

Pair	Confusion Rate (% of True Class)
Disgust→Neutral	58.9%
Fear→Surprise	39.0%
Sad→Neutral	35.7%
Angry→Neutral	22.5%
Surprise→Neutral	18.3%
Happy→Neutral	12.3%
Fear→Angry	11.9%
Fear→Neutral	11.9%
Fear→Sad	11.0%
Angry→Surprise	10.8%
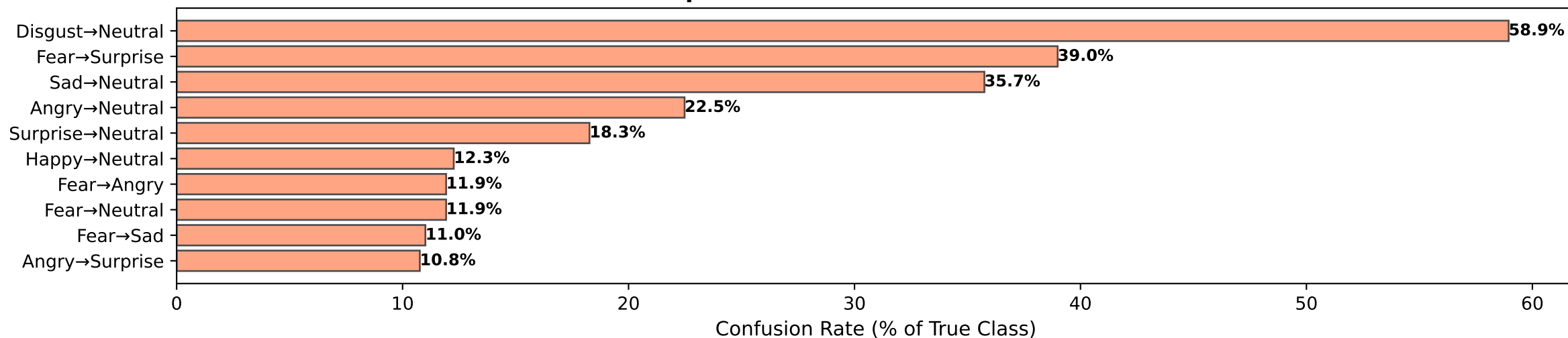
Error Distribution Matrix

True \ Predicted	Angry	Disgust	Fear	Happy	Sad	Surprise	Neutral
Angry	0.0	5.0	1.4	5.6	5.7	10.8	22.5
Disgust	4.9	0.0	0.4	7.5	10.6	3.0	58.9
Fear	11.9	0.9	0.0	7.3	11.0	39.0	11.9
Happy	0.3	0.3	0.0	0.0	1.2	1.5	12.3
Sad	1.5	3.1	0.7	7.9	0.0	3.6	35.7
Surprise	6.3	1.3	3.2	7.4	5.2	0.0	18.3
Neutral	0.8	1.5	0.1	9.2	5.6	1.9	0.0

```
ERROR ANALYSIS SUMMARY
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Overall Accuracy: 71.54%
Average Error Rate: 49.62%

Best Performing Class:
  • Happy: 84.43% accuracy

Worst Performing Class:
  • Disgust: 14.64% accuracy

Most Critical Confusions:
  1. Disgust → Neutral: 58.9%
  2. Fear → Surprise: 39.0%
  3. Sad → Neutral: 35.7%
```