EXPERIMENT 6

Training samples: 25000
Testing samples: 25000
Shape of training data: (25000, 200)
Shape of testing data: (25000, 200)
/usr/local/lib/python3.12/dist-packages/keras/src/layers/core/embedding.py:97: UserWarning: Argument `input_length` is deprecated. Just remove it.
  warnings.warn(
Model: "sequential"

Layer (type)	Output Shape	Param #
embedding (Embedding)	?	0 (unbuilt)
simple_rnn (SimpleRNN)	?	0 (unbuilt)
dense (Dense)	?	0 (unbuilt)

 Total params: 0 (0.00 B)
 Trainable params: 0 (0.00 B)
 Non-trainable params: 0 (0.00 B)
Epoch 1/3
313/313 ─────────────── 27s 81ms/step - accuracy: 0.6162 - loss: 0.6328 - val_accuracy: 0.6454 - val_loss: 0.6128
Epoch 2/3
313/313 ─────────────── 41s 83ms/step - accuracy: 0.8253 - loss: 0.4027 - val_accuracy: 0.8318 - val_loss: 0.3985
Epoch 3/3
313/313 ─────────────── 24s 78ms/step - accuracy: 0.9549 - loss: 0.1356 - val_accuracy: 0.7704 - val_loss: 0.5861
782/782 ─────────────── 9s 12ms/step
Classification Report:
              precision   recall f1-score   support

    Negative   0.75   0.82   0.78   12500
    Positive   0.80   0.72   0.76   12500

    accuracy   0.77   25000
   macro avg   0.77   0.77   0.77   25000
weighted avg   0.77   0.77   0.77   25000

Confusion Matrix:
[[10244 2256]
 [3504 8996]]

Accuracy   Loss