In [1]:
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#Build and train a feedforward neural network from scratch using TensorFlow/Ke
import numpy as np
from tensorflow.keras.models import Sequential
from tensorflow.keras.layers import Dense
from sklearn.model_selection import train_test_split
from sklearn.datasets import make_classification
from sklearn.preprocessing import StandardScaler

# Step 1: Create dummy dataset (1000 samples, 20 features, binary classificati
X, y = make_classification(n_samples=1000, n_features=20, n_classes=2, random_

# Step 2: Normalize the data
scaler = StandardScaler()
X = scaler.fit_transform(X)

# Step 3: Split the data
X_train, X_test, y_train, y_test = train_test_split(X, y, test_size=0.2, randc

# Step 4: Build the feedforward neural network
model = Sequential()
model.add(Dense(32, input_dim=20, activation='relu'))  # Input + Hidden layer
model.add(Dense(16, activation='relu'))                # Hidden layer 2
model.add(Dense(1, activation='sigmoid'))              # Output layer (binary)

# Step 5: Compile the model
model.compile(optimizer='adam', loss='binary_crossentropy', metrics=['accuracy

# Step 6: Train the model
model.fit(X_train, y_train, epochs=20, batch_size=16, validation_data=(X_test,

# Step 7: Evaluate the model
loss, accuracy = model.evaluate(X_test, y_test)
print("Test Accuracy:", accuracy)
```

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---------------------------------------------------------------------------
ModuleNotFoundError                       Traceback (most recent call last)
Cell In[1], line 3
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sorFlow/Keras
      2 import numpy as np
----> 3 from tensorflow.keras.models import Sequential
      4 from tensorflow.keras.layers import Dense
      5 from sklearn.model_selection import train_test_split

ModuleNotFoundError: No module named 'tensorflow'
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