

```
In [3]: import pandas as pd
import numpy as np
import seaborn as sns
import matplotlib.pyplot as plt
from sklearn.linear_model import LogisticRegression
from sklearn.preprocessing import StandardScaler
from sklearn.tree import DecisionTreeClassifier
from sklearn.ensemble import RandomForestClassifier
from sklearn.svm import SVC
from sklearn.naive_bayes import GaussianNB
from sklearn.neighbors import KNeighborsClassifier
from sklearn.metrics import confusion_matrix, accuracy_score, precision_score, recall_score
import seaborn as sns
from sklearn.model_selection import GridSearchCV
from sklearn.metrics import classification_report
```

```
In [4]: heart_set = pd.read_csv('heart.csv')
```

```
In [5]: heart_set.head(10)
```

```
Out[5]:
```

	Age	Sex	ChestPainType	RestingBP	Cholesterol	FastingBS	RestingECG	MaxHR	ExerciseAngina
--	-----	-----	---------------	-----------	-------------	-----------	------------	-------	----------------

0	40	M	ATA	140	289	0	Normal	172	0
1	49	F	NAP	160	180	0	Normal	156	0
2	37	M	ATA	130	283	0	ST	98	0
3	48	F	ASY	138	214	0	Normal	108	0
4	54	M	NAP	150	195	0	Normal	122	0
5	39	M	NAP	120	339	0	Normal	170	0
6	45	F	ATA	130	237	0	Normal	170	0
7	54	M	ATA	110	208	0	Normal	142	0
8	37	M	ASY	140	207	0	Normal	130	0
9	48	F	ATA	120	284	0	Normal	120	0



```
In [6]: heart_set.describe()
```

Out[6]:

	Age	RestingBP	Cholesterol	FastingBS	MaxHR	Oldpeak	HeartDisea
count	918.000000	918.000000	918.000000	918.000000	918.000000	918.000000	918.0000
mean	53.510893	132.396514	198.799564	0.233115	136.809368	0.887364	0.5533
std	9.432617	18.514154	109.384145	0.423046	25.460334	1.066570	0.4974
min	28.000000	0.000000	0.000000	0.000000	60.000000	-2.600000	0.0000
25%	47.000000	120.000000	173.250000	0.000000	120.000000	0.000000	0.0000
50%	54.000000	130.000000	223.000000	0.000000	138.000000	0.600000	1.0000
75%	60.000000	140.000000	267.000000	0.000000	156.000000	1.500000	1.0000
max	77.000000	200.000000	603.000000	1.000000	202.000000	6.200000	1.0000

In [11]: `heart_set.isnull().sum()`

```
Out[11]: Age          0
Sex          0
ChestPainType  0
RestingBP    0
Cholesterol  0
FastingBS    0
RestingECG   0
MaxHR        0
ExerciseAngina  0
Oldpeak      0
ST_Slope     0
HeartDisease  0
dtype: int64
```

In [13]: `print(heart_set.dtypes)`

```
Age          int64
Sex          object
ChestPainType object
RestingBP    int64
Cholesterol  int64
FastingBS    int64
RestingECG   object
MaxHR        int64
ExerciseAngina object
Oldpeak      float64
ST_Slope     object
HeartDisease int64
dtype: object
```

In [15]: `print('Total: ', len(heart_set))`

Total: 918

```
In [17]: heart_disease = heart_set[heart_set['HeartDisease'] == 1]
         No_heart_disease = heart_set[heart_set['HeartDisease'] == 0]
```

```
In [19]: print('Total Patients with heart diseases: ', len(heart_disease))
         print('Total Patients without heart diseases: ', len(No_heart_disease))
```

Total Patients with heart diseases: 508
Total Patients without heart diseases: 410

```
In [21]: from sklearn.preprocessing import LabelEncoder
         le = LabelEncoder()
         for col in ['Sex', 'ChestPainType', 'RestingECG', 'ExerciseAngina', 'ST_Slope']:
             heart_set[col] = le.fit_transform(heart_set[col])
```

```
In [23]: heart_set
```

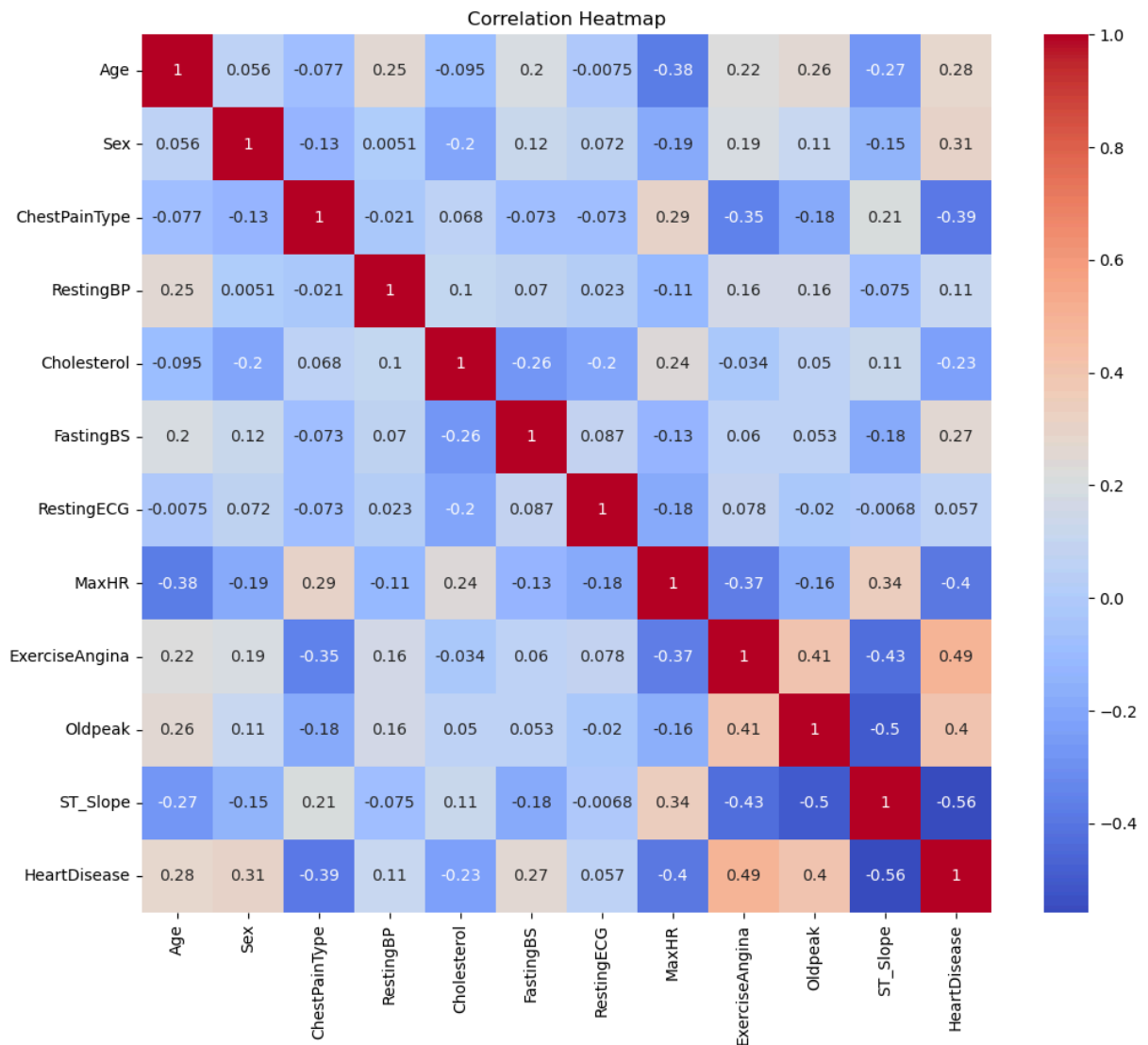
```
Out[23]:
```

	Age	Sex	ChestPainType	RestingBP	Cholesterol	FastingBS	RestingECG	MaxHR	Ex
0	40	1	1	140	289	0	1	172	
1	49	0	2	160	180	0	1	156	
2	37	1	1	130	283	0	2	98	
3	48	0	0	138	214	0	1	108	
4	54	1	2	150	195	0	1	122	
...	...	...	...	...	...	...	...	...	...
913	45	1	3	110	264	0	1	132	
914	68	1	0	144	193	1	1	141	
915	57	1	0	130	131	0	1	115	
916	57	0	1	130	236	0	0	174	
917	38	1	2	138	175	0	1	173	

918 rows × 12 columns



```
In [25]: plt.figure(figsize=(12, 10))
         sns.heatmap(heart_set.corr(), annot=True, cmap='coolwarm')
         plt.title('Correlation Heatmap')
         plt.show()
```



```
In [26]: X = heart_set.drop('HeartDisease', axis = 1).values
y = heart_set['HeartDisease'].values
```

```
In [29]: X
```

```
Out[29]: array([[40. , 1. , 1. , ..., 0. , 0. , 2. ],
 [49. , 0. , 2. , ..., 0. , 1. , 1. ],
 [37. , 1. , 1. , ..., 0. , 0. , 2. ],
 ...,
 [57. , 1. , 0. , ..., 1. , 1.2, 1. ],
 [57. , 0. , 1. , ..., 0. , 0. , 1. ],
 [38. , 1. , 2. , ..., 0. , 0. , 2. ]])
```

```
In [31]: y
```

```
Out[31]: array([0, 1, 0, 1, 0, 0, 0, 0, 1, 0, 0, 1, 0, 1, 0, 0, 1, 0, 1, 1, 0, 0,
                0, 1, 0, 0, 0, 0, 0, 0, 1, 0, 1, 1, 0, 0, 1, 0, 0, 0, 0, 1, 0, 0,
                1, 0, 0, 0, 0, 1, 1, 1, 0, 0, 0, 0, 1, 1, 0, 1, 0, 0, 0, 1, 0, 0,
                0, 0, 1, 0, 1, 0, 1, 0, 1, 0, 1, 0, 0, 1, 0, 0, 1, 0, 1, 1, 1, 0,
                1, 0, 0, 0, 0, 1, 0, 1, 0, 0, 0, 0, 1, 0, 1, 1, 1, 0, 0, 0, 0, 0,
                0, 1, 0, 0, 0, 1, 1, 1, 0, 1, 1, 0, 0, 1, 0, 0, 0, 0, 0, 0, 0, 1,
                1, 1, 0, 1, 0, 0, 1, 1, 1, 1, 1, 0, 1, 0, 0, 0, 0, 1, 0, 0, 0, 0,
                0, 1, 1, 0, 1, 0, 1, 1, 0, 0, 0, 1, 1, 0, 0, 0, 0, 0, 0, 0, 1, 1,
                1, 0, 0, 0, 1, 0, 1, 0, 0, 1, 0, 1, 0, 1, 0, 0, 0, 0, 0, 0, 0,
                1, 0, 0, 0, 0, 0, 0, 0, 0, 1, 0, 1, 1, 1, 0, 0, 1, 0, 1, 0, 0, 0,
                1, 1, 0, 0, 0, 1, 0, 1, 0, 0, 0, 0, 0, 0, 0, 1, 1, 1, 1, 0, 1,
                1, 0, 1, 0, 1, 1, 1, 1, 1, 1, 0, 0, 1, 0, 0, 0, 0, 0, 0, 1, 1,
                1, 0, 1, 0, 1, 0, 0, 0, 1, 0, 0, 0, 1, 1, 0, 0, 0, 1, 0, 0, 0,
                0, 0, 0, 0, 0, 1, 1, 1, 1, 1, 1, 1, 1, 0, 1, 1, 1, 1, 1, 0,
                1, 1, 0, 1, 1, 1, 0, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 0, 1, 1, 1,
                1, 1, 0, 1, 1, 1, 0, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1,
                1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1,
                1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 0,
                1, 1, 0, 0, 1, 0, 1, 1, 0, 1, 1, 1, 1, 0, 1, 1, 0, 0, 1, 1, 1,
                0, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 0, 1, 0, 1, 1, 0, 1, 1,
                1, 0, 1, 0, 1, 0, 1, 1, 1, 1, 1, 0, 1, 1, 1, 1, 1, 1, 1, 1,
                1, 1, 0, 1, 0, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1,
                1, 1, 0, 1, 0, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1,
                1, 0, 1, 0, 1, 0, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1,
                1, 0, 1, 1, 0, 1, 0, 1, 1, 0, 1, 1, 1, 1, 0, 1, 1, 1, 0, 0,
                1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 1, 0,
                1, 0, 0, 0, 1, 0, 0, 1, 0, 1, 1, 1, 0, 0, 0, 1, 0, 0, 1, 1,
                0, 1, 0, 0, 1, 1, 1, 0, 1, 0, 0, 0, 0, 0, 1, 0, 1, 1, 0, 0, 1,
                1, 1, 0, 0, 1, 1, 0, 0, 0, 1, 0, 0, 1, 0, 1, 0, 1, 0, 0, 0, 0,
                1, 0, 1, 1, 1, 1, 0, 0, 0, 1, 0, 0, 1, 0, 1, 0, 0, 0, 0, 0, 0,
                1, 0, 1, 0, 0, 1, 1, 0, 0, 1, 1, 0, 1, 0, 1, 0, 1, 0, 0, 1, 0,
                0, 0, 0, 0, 1, 0, 0, 1, 1, 1, 0, 0, 0, 1, 0, 1, 0, 1, 0, 1,
                0, 0, 0, 1, 0, 0, 1, 1, 1, 0, 0, 0, 1, 0, 1, 0, 1, 0, 1, 1,
                0, 0, 0, 1, 0, 1, 1, 1, 0, 1, 1, 1, 1, 1, 1, 1, 0], dtype=int64)
```

```
In [33]: sc = StandardScaler()
X = sc.fit_transform(X)
print(X)
```

```

[[-1.4331398  0.51595242  0.22903206 ... -0.8235563 -0.83243239
  1.05211381]
 [-0.47848359 -1.93816322  1.27505906 ... -0.8235563  0.10566353
 -0.59607813]
 [-1.75135854  0.51595242  0.22903206 ... -0.8235563 -0.83243239
  1.05211381]
 ...
 [ 0.37009972  0.51595242 -0.81699495 ...  1.21424608  0.29328271
 -0.59607813]
 [ 0.37009972 -1.93816322  0.22903206 ... -0.8235563 -0.83243239
 -0.59607813]
 [-1.64528563  0.51595242  1.27505906 ... -0.8235563 -0.83243239
  1.05211381]]

```

```

In [35]: from sklearn.model_selection import train_test_split
X_train, X_test, y_train, y_test = train_test_split(X, y, test_size=0.3, random_st

```

```

In [37]: param_grid_lr = {
        'C': [0.1, 1, 10],
        'penalty': ['l2'],
        'solver': ['lbfgs', 'liblinear']}
    }
    grid_lr = GridSearchCV(LogisticRegression(random_state=0, max_iter=1000),
                           param_grid_lr, cv=5, scoring='accuracy', n_jobs=-1)
    grid_lr.fit(X_train, y_train)

    classifier = grid_lr.best_estimator_
    print("Best LR params:", grid_lr.best_params_)

    y_predict_test = classifier.predict(X_test)
    print(classification_report(y_test, y_predict_test))

```

Best LR params: {'C': 0.1, 'penalty': 'l2', 'solver': 'liblinear'}

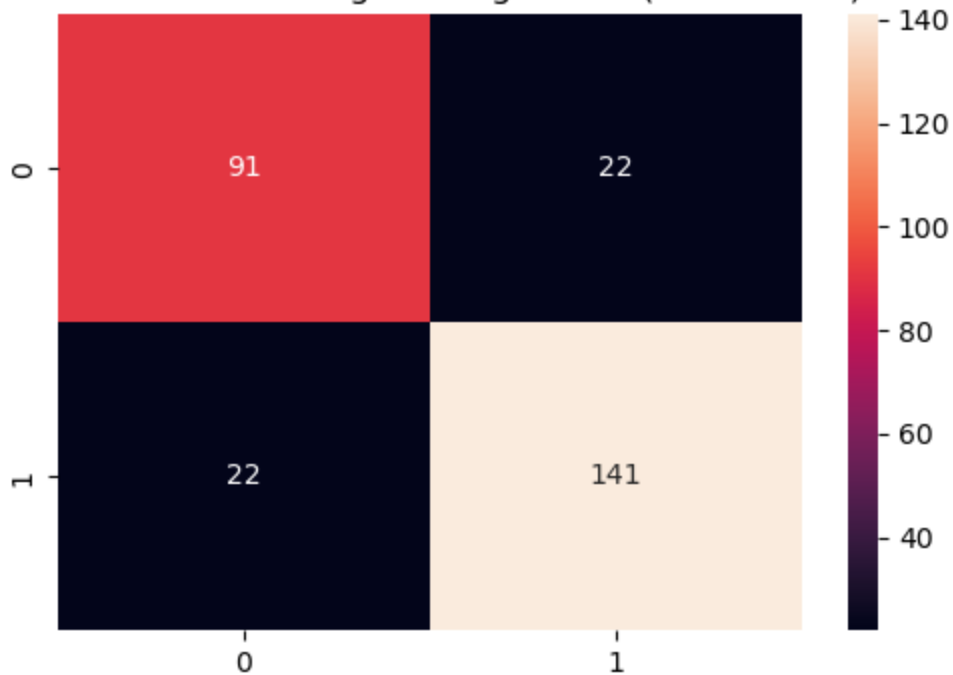
	precision	recall	f1-score	support
0	0.81	0.81	0.81	113
1	0.87	0.87	0.87	163
accuracy			0.84	276
macro avg	0.84	0.84	0.84	276
weighted avg	0.84	0.84	0.84	276

```

In [39]: cm = confusion_matrix(y_test, y_predict_test)
plt.figure(figsize=(6,4))
sns.heatmap(cm, annot=True, fmt='d')
plt.title('Confusion Matrix - Logistic Regression (Grid Search)')
plt.show()

```

Confusion Matrix - Logistic Regression (Grid Search)



```
In [41]: param_grid_svc = {
          'C': [0.1, 1, 10],
          'gamma': ['scale', 'auto', 0.1, 1],
          'kernel': ['rbf', 'linear']
        }
        grid_svc = GridSearchCV(SVC(random_state=0), param_grid_svc, cv=5, scoring='accuracy')
        grid_svc.fit(X_train, y_train)
```

```
Out[41]: GridSearchCV
          estimator: SVC
            SVC
```

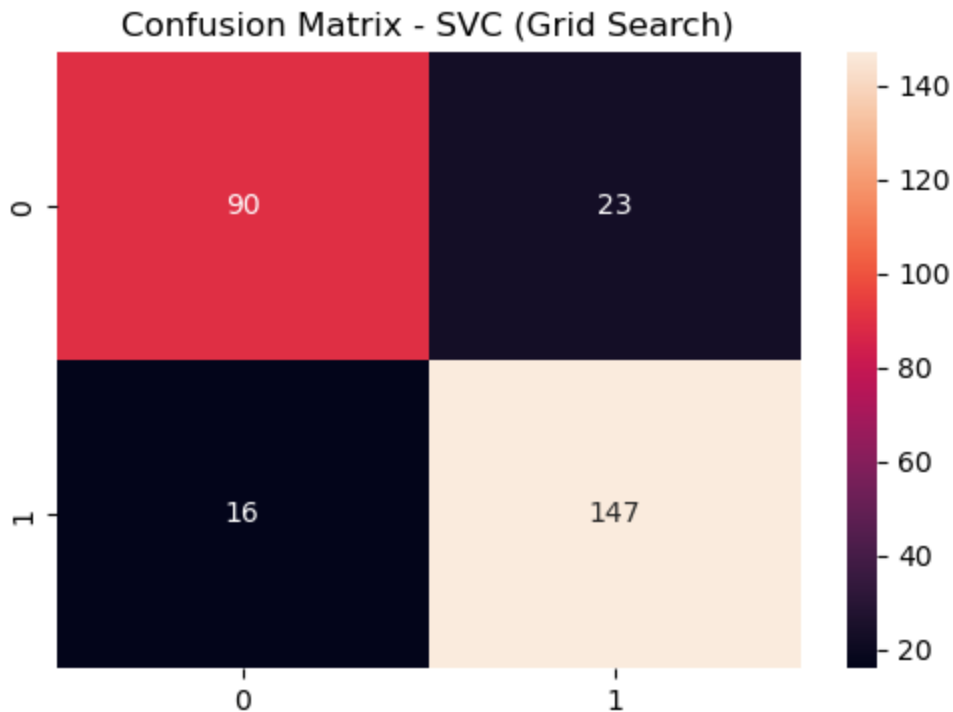
```
In [43]: best_svc = grid_svc.best_estimator_
        print("Best SVC params:", grid_svc.best_params_)
```

Best SVC params: {'C': 1, 'gamma': 'scale', 'kernel': 'rbf'}

```
In [45]: y_pred_svc = best_svc.predict(X_test)
        print(classification_report(y_test, y_pred_svc))
```

	precision	recall	f1-score	support
0	0.85	0.80	0.82	113
1	0.86	0.90	0.88	163
accuracy			0.86	276
macro avg	0.86	0.85	0.85	276
weighted avg	0.86	0.86	0.86	276

```
In [47]: cm_svc = confusion_matrix(y_test, y_pred_svc)
plt.figure(figsize=(6,4))
sns.heatmap(cm_svc, annot=True, fmt='d')
plt.title('Confusion Matrix - SVC (Grid Search)')
plt.show()
```



```
In [51]: param_grid_knn = {
    'n_neighbors': [3, 5, 7, 9, 11],
    'weights': ['uniform', 'distance'],
    'p': [1, 2]
}
grid_knn = GridSearchCV(KNeighborsClassifier(), param_grid_knn, cv=5, scoring='accu
grid_knn.fit(X_train, y_train)
```

```
Out[51]:
```

GridSearchCV ⓘ ?

▶ **estimator: KNeighborsClassifier**

▶ **KNeighborsClassifier** ?

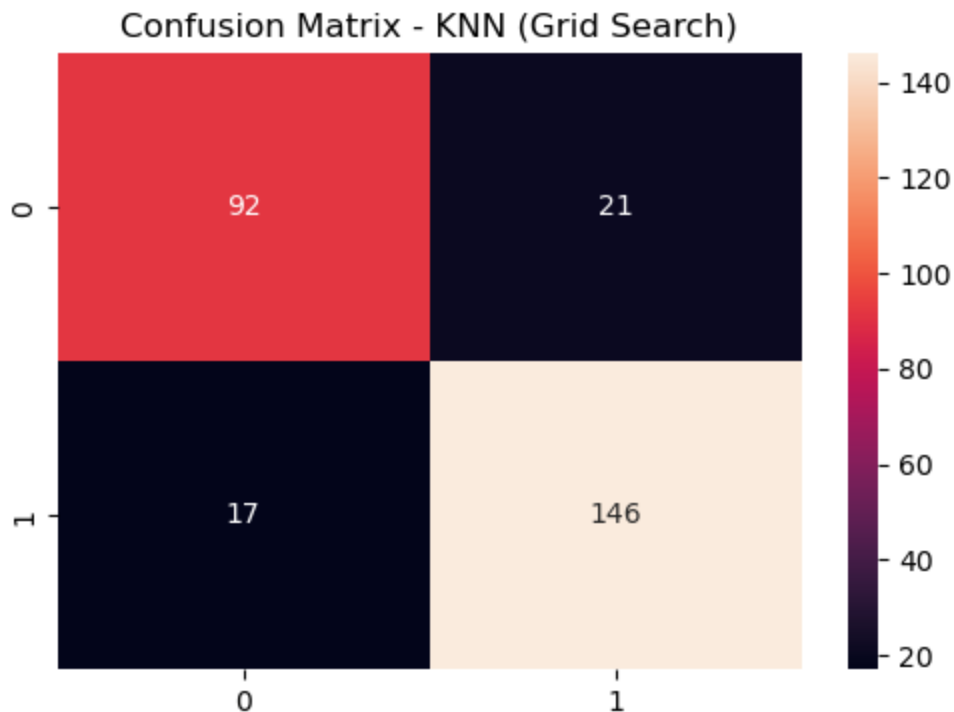
```
In [53]: best_knn = grid_knn.best_estimator_
print("Best KNN params:", grid_knn.best_params_)
```

Best KNN params: {'n_neighbors': 11, 'p': 1, 'weights': 'uniform'}

```
In [55]: y_pred_knn = best_knn.predict(X_test)
print(classification_report(y_test, y_pred_knn))
```

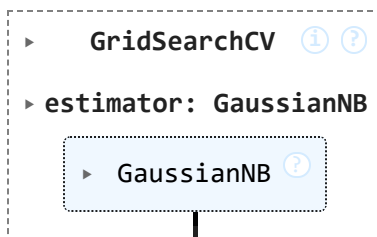
	precision	recall	f1-score	support
0	0.84	0.81	0.83	113
1	0.87	0.90	0.88	163
accuracy			0.86	276
macro avg	0.86	0.85	0.86	276
weighted avg	0.86	0.86	0.86	276

```
In [57]: cm_knn = confusion_matrix(y_test, y_pred_knn)
plt.figure(figsize=(6,4))
sns.heatmap(cm_knn, annot=True, fmt='d')
plt.title('Confusion Matrix - KNN (Grid Search)')
plt.show()
```



```
In [59]: param_grid_nb = {
          'var_smoothing': [1e-9, 1e-8, 1e-7, 1e-6, 1e-5]
        }
grid_nb = GridSearchCV(GaussianNB(), param_grid_nb, cv=5, scoring='accuracy', n_job
grid_nb.fit(X_train, y_train)
```

Out[59]:



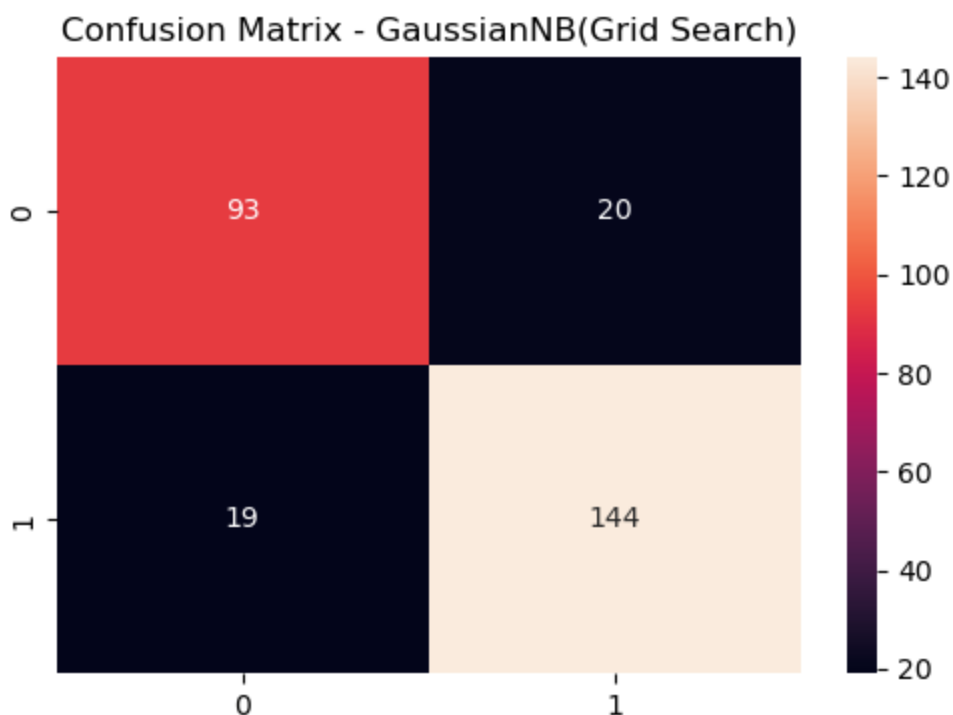
```
In [61]: best_nb = grid_nb.best_estimator_
print("Best GaussianNB params:", grid_nb.best_params_)
```

Best GaussianNB params: {'var_smoothing': 1e-09}

```
In [63]: y_pred_nb = best_nb.predict(X_test)
print(classification_report(y_test, y_pred_nb))
```

	precision	recall	f1-score	support
0	0.83	0.82	0.83	113
1	0.88	0.88	0.88	163
accuracy			0.86	276
macro avg	0.85	0.85	0.85	276
weighted avg	0.86	0.86	0.86	276

```
In [65]: cm_nb = confusion_matrix(y_test, y_pred_nb)
plt.figure(figsize=(6,4))
sns.heatmap(cm_nb, annot=True, fmt='d')
plt.title('Confusion Matrix - GaussianNB(Grid Search)')
plt.show()
```



```
In [69]: results = []
for name, y_pred in [('Logistic Regression', y_predict_test),
                    ('SVC', y_pred_svc),
                    ('KNN', y_pred_knn),
                    ('GaussianNB', y_pred_nb)]:
    acc = accuracy_score(y_test, y_pred)
    results.append([name, acc])

results_df = pd.DataFrame(results, columns=['Model', 'Test accuracy'])
print(results_df.sort_values('Test accuracy', ascending=False))
```

	Model	Test accuracy
2	KNN	0.862319
1	SVC	0.858696
3	GaussianNB	0.858696
0	Logistic Regression	0.840580

```
In [71]: from sklearn.feature_selection import SelectKBest, f_classif, RFE
        from sklearn.linear_model import LogisticRegression
```

```
In [73]: feature_names = ['Age', 'Sex', 'ChestPainType', 'RestingBP', 'Cholesterol',
                        'FastingBS', 'RestingECG', 'MaxHR', 'ExerciseAngina',
                        'Oldpeak', 'ST_Slope']
```

```
In [75]: selector_kbest = SelectKBest(score_func=f_classif, k=8) # keep top 8 features
        X_train_kbest = selector_kbest.fit_transform(X_train, y_train)
        X_test_kbest = selector_kbest.transform(X_test)
```

```
In [77]: selected_kbest = [feature_names[i] for i in selector_kbest.get_support(indices=True)]
        print("Selected features by SelectKBest:", selected_kbest)
```

Selected features by SelectKBest: ['Age', 'Sex', 'ChestPainType', 'FastingBS', 'MaxHR', 'ExerciseAngina', 'Oldpeak', 'ST_Slope']

```
In [79]: estimator_rfe = LogisticRegression(max_iter=1000, random_state=0)
        selector_rfe = RFE(estimator=estimator_rfe, n_features_to_select=8)
        X_train_rfe = selector_rfe.fit_transform(X_train, y_train)
        X_test_rfe = selector_rfe.transform(X_test)
```

```
In [81]: selected_rfe = [feature_names[i] for i in selector_rfe.get_support(indices=True)]
        print("Selected features by RFE:", selected_rfe)
```

Selected features by RFE: ['Sex', 'ChestPainType', 'FastingBS', 'RestingECG', 'MaxHR', 'ExerciseAngina', 'Oldpeak', 'ST_Slope']

```
In [83]: def evaluate_model(model, X_tr, X_te, y_tr, y_te, model_name, feature_method):
        model.fit(X_tr, y_tr)
        y_pred = model.predict(X_te)
        acc = accuracy_score(y_te, y_pred)
        print(f"\n{model_name} | {feature_method} | Accuracy: {acc:.4f}")
        print(classification_report(y_te, y_pred))
        return acc
```

```
In [85]: lr_best = LogisticRegression(C=0.1, penalty='l2', solver='liblinear', max_iter=1000)
        svc_best = SVC(C=1, gamma='scale', kernel='rbf', random_state=0)
        knn_best = KNeighborsClassifier(n_neighbors=11, p=1, weights='uniform')
        nb_best = GaussianNB(var_smoothing=1e-09)
```

```
In [87]: print("="*50)
        print("Results using SelectKBest features")
        print("="*50)
        evaluate_model(lr_best, X_train_kbest, X_test_kbest, y_train, y_test, "Logistic Reg
        evaluate_model(svc_best, X_train_kbest, X_test_kbest, y_train, y_test, "SVC", "Sele
```

```
=====
Results using SelectKBest features
=====
```

```
Logistic Regression | SelectKBest | Accuracy: 0.8370
      precision    recall  f1-score   support

         0         0.81      0.79      0.80         113
         1         0.86      0.87      0.86         163

   accuracy                   0.84         276
  macro avg         0.83      0.83      0.83         276
 weighted avg         0.84      0.84      0.84         276
```

```
SVC | SelectKBest | Accuracy: 0.8442
      precision    recall  f1-score   support

         0         0.82      0.80      0.81         113
         1         0.86      0.88      0.87         163

   accuracy                   0.84         276
  macro avg         0.84      0.84      0.84         276
 weighted avg         0.84      0.84      0.84         276
```

Out[87]: 0.8442028985507246

```
In [89]: print("\n" + "="*50)
          print("Results using RFE features")
          print("="*50)
          evaluate_model(lr_best, X_train_rfe, X_test_rfe, y_train, y_test, "Logistic Regress
          evaluate_model(svc_best, X_train_rfe, X_test_rfe, y_train, y_test, "SVC", "RFE")
```

```
=====
Results using RFE features
=====
```

```
Logistic Regression | RFE | Accuracy: 0.8297
      precision      recall  f1-score   support

      0      0.80      0.78      0.79      113
      1      0.85      0.87      0.86      163

   accuracy                   0.83      276
  macro avg      0.82      0.82      0.82      276
 weighted avg      0.83      0.83      0.83      276
```

```
SVC | RFE | Accuracy: 0.8442
      precision      recall  f1-score   support

      0      0.82      0.80      0.81      113
      1      0.86      0.88      0.87      163

   accuracy                   0.84      276
  macro avg      0.84      0.84      0.84      276
 weighted avg      0.84      0.84      0.84      276
```

```
Out[89]: 0.8442028985507246
```

```
In [ ]:
```

Age	Sex	ChestPain	RestingBP	Cholestero	FastingBS	RestingECG	MaxHR	ExerciseAn	Oldpeak
40	M	ATA	140	289	0	Normal	172	N	0
49	F	NAP	160	180	0	Normal	156	N	1
37	M	ATA	130	283	0	ST	98	N	0
48	F	ASY	138	214	0	Normal	108	Y	1.5
54	M	NAP	150	195	0	Normal	122	N	0
39	M	NAP	120	339	0	Normal	170	N	0
45	F	ATA	130	237	0	Normal	170	N	0
54	M	ATA	110	208	0	Normal	142	N	0
37	M	ASY	140	207	0	Normal	130	Y	1.5
48	F	ATA	120	284	0	Normal	120	N	0
37	F	NAP	130	211	0	Normal	142	N	0
58	M	ATA	136	164	0	ST	99	Y	2
39	M	ATA	120	204	0	Normal	145	N	0
49	M	ASY	140	234	0	Normal	140	Y	1
42	F	NAP	115	211	0	ST	137	N	0
54	F	ATA	120	273	0	Normal	150	N	1.5
38	M	ASY	110	196	0	Normal	166	N	0
43	F	ATA	120	201	0	Normal	165	N	0
60	M	ASY	100	248	0	Normal	125	N	1
36	M	ATA	120	267	0	Normal	160	N	3
43	F	TA	100	223	0	Normal	142	N	0
44	M	ATA	120	184	0	Normal	142	N	1
49	F	ATA	124	201	0	Normal	164	N	0
44	M	ATA	150	288	0	Normal	150	Y	3
40	M	NAP	130	215	0	Normal	138	N	0
36	M	NAP	130	209	0	Normal	178	N	0
53	M	ASY	124	260	0	ST	112	Y	3
52	M	ATA	120	284	0	Normal	118	N	0
53	F	ATA	113	468	0	Normal	127	N	0
51	M	ATA	125	188	0	Normal	145	N	0
53	M	NAP	145	518	0	Normal	130	N	0
56	M	NAP	130	167	0	Normal	114	N	0
54	M	ASY	125	224	0	Normal	122	N	2
41	M	ASY	130	172	0	ST	130	N	2
43	F	ATA	150	186	0	Normal	154	N	0
32	M	ATA	125	254	0	Normal	155	N	0
65	M	ASY	140	306	1	Normal	87	Y	1.5
41	F	ATA	110	250	0	ST	142	N	0
48	F	ATA	120	177	1	ST	148	N	0
48	F	ASY	150	227	0	Normal	130	Y	1
54	F	ATA	150	230	0	Normal	130	N	0
54	F	NAP	130	294	0	ST	100	Y	0
35	M	ATA	150	264	0	Normal	168	N	0
52	M	NAP	140	259	0	ST	170	N	0
43	M	ASY	120	175	0	Normal	120	Y	1
59	M	NAP	130	318	0	Normal	120	Y	1

37 M	ASY	120	223	0 Normal	168 N	0
50 M	ATA	140	216	0 Normal	170 N	0
36 M	NAP	112	340	0 Normal	184 N	1
41 M	ASY	110	289	0 Normal	170 N	0
50 M	ASY	130	233	0 Normal	121 Y	2
47 F	ASY	120	205	0 Normal	98 Y	2
45 M	ATA	140	224	1 Normal	122 N	0
41 F	ATA	130	245	0 Normal	150 N	0
52 F	ASY	130	180	0 Normal	140 Y	1.5
51 F	ATA	160	194	0 Normal	170 N	0
31 M	ASY	120	270	0 Normal	153 Y	1.5
58 M	NAP	130	213	0 ST	140 N	0
54 M	ASY	150	365	0 ST	134 N	1
52 M	ASY	112	342	0 ST	96 Y	1
49 M	ATA	100	253	0 Normal	174 N	0
43 F	NAP	150	254	0 Normal	175 N	0
45 M	ASY	140	224	0 Normal	144 N	0
46 M	ASY	120	277	0 Normal	125 Y	1
50 F	ATA	110	202	0 Normal	145 N	0
37 F	ATA	120	260	0 Normal	130 N	0
45 F	ASY	132	297	0 Normal	144 N	0
32 M	ATA	110	225	0 Normal	184 N	0
52 M	ASY	160	246	0 ST	82 Y	4
44 M	ASY	150	412	0 Normal	170 N	0
57 M	ATA	140	265	0 ST	145 Y	1
44 M	ATA	130	215	0 Normal	135 N	0
52 M	ASY	120	182	0 Normal	150 N	0
44 F	ASY	120	218	0 ST	115 N	0
55 M	ASY	140	268	0 Normal	128 Y	1.5
46 M	NAP	150	163	0 Normal	116 N	0
32 M	ASY	118	529	0 Normal	130 N	0
35 F	ASY	140	167	0 Normal	150 N	0
52 M	ATA	140	100	0 Normal	138 Y	0
49 M	ASY	130	206	0 Normal	170 N	0
55 M	NAP	110	277	0 Normal	160 N	0
54 M	ATA	120	238	0 Normal	154 N	0
63 M	ASY	150	223	0 Normal	115 N	0
52 M	ATA	160	196	0 Normal	165 N	0
56 M	ASY	150	213	1 Normal	125 Y	1
66 M	ASY	140	139	0 Normal	94 Y	1
65 M	ASY	170	263	1 Normal	112 Y	2
53 F	ATA	140	216	0 Normal	142 Y	2
43 M	TA	120	291	0 ST	155 N	0
55 M	ASY	140	229	0 Normal	110 Y	0.5
49 F	ATA	110	208	0 Normal	160 N	0
39 M	ASY	130	307	0 Normal	140 N	0
52 F	ATA	120	210	0 Normal	148 N	0

48 M	ASY	160	329	0 Normal	92 Y	1.5
39 F	NAP	110	182	0 ST	180 N	0
58 M	ASY	130	263	0 Normal	140 Y	2
43 M	ATA	142	207	0 Normal	138 N	0
39 M	NAP	160	147	1 Normal	160 N	0
56 M	ASY	120	85	0 Normal	140 N	0
41 M	ATA	125	269	0 Normal	144 N	0
65 M	ASY	130	275	0 ST	115 Y	1
51 M	ASY	130	179	0 Normal	100 N	0
40 F	ASY	150	392	0 Normal	130 N	2
40 M	ASY	120	466	1 Normal	152 Y	1
46 M	ASY	118	186	0 Normal	124 N	0
57 M	ATA	140	260	1 Normal	140 N	0
48 F	ASY	120	254	0 ST	110 N	0
34 M	ATA	150	214	0 ST	168 N	0
50 M	ASY	140	129	0 Normal	135 N	0
39 M	ATA	190	241	0 Normal	106 N	0
59 F	ATA	130	188	0 Normal	124 N	1
57 M	ASY	150	255	0 Normal	92 Y	3
47 M	ASY	140	276	1 Normal	125 Y	0
38 M	ATA	140	297	0 Normal	150 N	0
49 F	NAP	130	207	0 ST	135 N	0
33 F	ASY	100	246	0 Normal	150 Y	1
38 M	ASY	120	282	0 Normal	170 N	0
59 F	ASY	130	338	1 ST	130 Y	1.5
35 F	TA	120	160	0 ST	185 N	0
34 M	TA	140	156	0 Normal	180 N	0
47 F	NAP	135	248	1 Normal	170 N	0
52 F	NAP	125	272	0 Normal	139 N	0
46 M	ASY	110	240	0 ST	140 N	0
58 F	ATA	180	393	0 Normal	110 Y	1
58 M	ATA	130	230	0 Normal	150 N	0
54 M	ATA	120	246	0 Normal	110 N	0
34 F	ATA	130	161	0 Normal	190 N	0
48 F	ASY	108	163	0 Normal	175 N	2
54 F	ATA	120	230	1 Normal	140 N	0
42 M	NAP	120	228	0 Normal	152 Y	1.5
38 M	NAP	145	292	0 Normal	130 N	0
46 M	ASY	110	202	0 Normal	150 Y	0
56 M	ASY	170	388	0 ST	122 Y	2
56 M	ASY	150	230	0 ST	124 Y	1.5
61 F	ASY	130	294	0 ST	120 Y	1
49 M	NAP	115	265	0 Normal	175 N	0
43 F	ATA	120	215	0 ST	175 N	0
39 M	ATA	120	241	0 ST	146 N	2
54 M	ASY	140	166	0 Normal	118 Y	0
43 M	ASY	150	247	0 Normal	130 Y	2

52 M	ASY	160	331	0 Normal	94 Y	2.5
50 M	ASY	140	341	0 ST	125 Y	2.5
47 M	ASY	160	291	0 ST	158 Y	3
53 M	ASY	140	243	0 Normal	155 N	0
56 F	ATA	120	279	0 Normal	150 N	1
39 M	ASY	110	273	0 Normal	132 N	0
42 M	ATA	120	198	0 Normal	155 N	0
43 F	ATA	120	249	0 ST	176 N	0
50 M	ATA	120	168	0 Normal	160 N	0
54 M	ASY	130	603	1 Normal	125 Y	1
39 M	ATA	130	215	0 Normal	120 N	0
48 M	ATA	100	159	0 Normal	100 N	0
40 M	ATA	130	275	0 Normal	150 N	0
55 M	ASY	120	270	0 Normal	140 N	0
41 M	ATA	120	291	0 ST	160 N	0
56 M	ASY	155	342	1 Normal	150 Y	3
38 M	ASY	110	190	0 Normal	150 Y	1
49 M	ASY	140	185	0 Normal	130 N	0
44 M	ASY	130	290	0 Normal	100 Y	2
54 M	ATA	160	195	0 ST	130 N	1
59 M	ASY	140	264	1 LVH	119 Y	0
49 M	ASY	128	212	0 Normal	96 Y	0
47 M	ATA	160	263	0 Normal	174 N	0
42 M	ATA	120	196	0 Normal	150 N	0
52 F	ATA	140	225	0 Normal	140 N	0
46 M	TA	140	272	1 Normal	175 N	2
50 M	ASY	140	231	0 ST	140 Y	5
48 M	ATA	140	238	0 Normal	118 N	0
58 M	ASY	135	222	0 Normal	100 N	0
58 M	NAP	140	179	0 Normal	160 N	0
29 M	ATA	120	243	0 Normal	160 N	0
40 M	NAP	140	235	0 Normal	188 N	0
53 M	ATA	140	320	0 Normal	162 N	0
49 M	NAP	140	187	0 Normal	172 N	0
52 M	ASY	140	266	0 Normal	134 Y	2
43 M	ASY	140	288	0 Normal	135 Y	2
54 M	ASY	140	216	0 Normal	105 N	1.5
59 M	ATA	140	287	0 Normal	150 N	0
37 M	NAP	130	194	0 Normal	150 N	0
46 F	ASY	130	238	0 Normal	90 N	0
52 M	ASY	130	225	0 Normal	120 Y	2
51 M	ATA	130	224	0 Normal	150 N	0
52 M	ASY	140	404	0 Normal	124 Y	2
46 M	ASY	110	238	0 ST	140 Y	1
54 F	ATA	160	312	0 Normal	130 N	0
58 M	NAP	160	211	1 ST	92 N	0
58 M	ATA	130	251	0 Normal	110 N	0

41 M	ASY	120	237	1 Normal	138 Y	1
50 F	ASY	120	328	0 Normal	110 Y	1
53 M	ASY	180	285	0 ST	120 Y	1.5
46 M	ASY	180	280	0 ST	120 N	0
50 M	ATA	170	209	0 ST	116 N	0
48 M	ATA	130	245	0 Normal	160 N	0
45 M	NAP	135	192	0 Normal	110 N	0
41 F	ATA	125	184	0 Normal	180 N	0
62 F	TA	160	193	0 Normal	116 N	0
49 M	ASY	120	297	0 Normal	132 N	1
42 M	ATA	150	268	0 Normal	136 N	0
53 M	ASY	120	246	0 Normal	116 Y	0
57 F	TA	130	308	0 Normal	98 N	1
47 M	TA	110	249	0 Normal	150 N	0
46 M	NAP	120	230	0 Normal	150 N	0
42 M	NAP	160	147	0 Normal	146 N	0
31 F	ATA	100	219	0 ST	150 N	0
56 M	ATA	130	184	0 Normal	100 N	0
50 M	ASY	150	215	0 Normal	140 Y	0
35 M	ATA	120	308	0 LVH	180 N	0
35 M	ATA	110	257	0 Normal	140 N	0
28 M	ATA	130	132	0 LVH	185 N	0
54 M	ASY	125	216	0 Normal	140 N	0
48 M	ASY	106	263	1 Normal	110 N	0
50 F	NAP	140	288	0 Normal	140 Y	0
56 M	NAP	130	276	0 Normal	128 Y	1
56 F	NAP	130	219	0 ST	164 N	0
47 M	ASY	150	226	0 Normal	98 Y	1.5
30 F	TA	170	237	0 ST	170 N	0
39 M	ASY	110	280	0 Normal	150 N	0
54 M	NAP	120	217	0 Normal	137 N	0
55 M	ATA	140	196	0 Normal	150 N	0
29 M	ATA	140	263	0 Normal	170 N	0
46 M	ASY	130	222	0 Normal	112 N	0
51 F	ASY	160	303	0 Normal	150 Y	1
48 F	NAP	120	195	0 Normal	125 N	0
33 M	NAP	120	298	0 Normal	185 N	0
55 M	ATA	120	256	1 Normal	137 N	0
50 M	ASY	145	264	0 Normal	150 N	0
53 M	NAP	120	195	0 Normal	140 N	0
38 M	ASY	92	117	0 Normal	134 Y	2.5
41 M	ATA	120	295	0 Normal	170 N	0
37 F	ASY	130	173	0 ST	184 N	0
37 M	ASY	130	315	0 Normal	158 N	0
40 M	NAP	130	281	0 Normal	167 N	0
38 F	ATA	120	275	0 Normal	129 N	0
41 M	ASY	112	250	0 Normal	142 N	0

54 F	ATA	140	309	0 ST	140 N	0
39 M	ATA	120	200	0 Normal	160 Y	1
41 M	ASY	120	336	0 Normal	118 Y	3
55 M	TA	140	295	0 Normal	136 N	0
48 M	ASY	160	355	0 Normal	99 Y	2
48 M	ASY	160	193	0 Normal	102 Y	3
55 M	ATA	145	326	0 Normal	155 N	0
54 M	ASY	200	198	0 Normal	142 Y	2
55 M	ATA	160	292	1 Normal	143 Y	2
43 F	ATA	120	266	0 Normal	118 N	0
48 M	ASY	160	268	0 Normal	103 Y	1
54 M	TA	120	171	0 Normal	137 N	2
54 M	NAP	120	237	0 Normal	150 Y	1.5
48 M	ASY	122	275	1 ST	150 Y	2
45 M	ASY	130	219	0 ST	130 Y	1
49 M	ASY	130	341	0 Normal	120 Y	1
44 M	ASY	135	491	0 Normal	135 N	0
48 M	ASY	120	260	0 Normal	115 N	2
61 M	ASY	125	292	0 ST	115 Y	0
62 M	ATA	140	271	0 Normal	152 N	1
55 M	ASY	145	248	0 Normal	96 Y	2
53 F	NAP	120	274	0 Normal	130 N	0
55 F	ATA	130	394	0 LVH	150 N	0
36 M	NAP	150	160	0 Normal	172 N	0
51 F	NAP	150	200	0 Normal	120 N	0.5
55 F	ATA	122	320	0 Normal	155 N	0
46 M	ATA	140	275	0 Normal	165 Y	0
54 F	ATA	120	221	0 Normal	138 N	1
46 M	ASY	120	231	0 Normal	115 Y	0
59 M	ASY	130	126	0 Normal	125 N	0
47 M	NAP	140	193	0 Normal	145 Y	1
54 M	ATA	160	305	0 Normal	175 N	0
52 M	ASY	130	298	0 Normal	110 Y	1
34 M	ATA	98	220	0 Normal	150 N	0
54 M	ASY	130	242	0 Normal	91 Y	1
47 F	NAP	130	235	0 Normal	145 N	2
45 M	ASY	120	225	0 Normal	140 N	0
32 F	ATA	105	198	0 Normal	165 N	0
55 M	ASY	140	201	0 Normal	130 Y	3
55 M	NAP	120	220	0 LVH	134 N	0
45 F	ATA	180	295	0 Normal	180 N	0
59 M	NAP	180	213	0 Normal	100 N	0
51 M	NAP	135	160	0 Normal	150 N	2
52 M	ASY	170	223	0 Normal	126 Y	1.5
57 F	ASY	180	347	0 ST	126 Y	0.8
54 F	ATA	130	253	0 ST	155 N	0
60 M	NAP	120	246	0 LVH	135 N	0

49 M	ASY	150	222	0 Normal	122 N	2
51 F	NAP	130	220	0 Normal	160 Y	2
55 F	ATA	110	344	0 ST	160 N	0
42 M	ASY	140	358	0 Normal	170 N	0
51 F	NAP	110	190	0 Normal	120 N	0
59 M	ASY	140	169	0 Normal	140 N	0
53 M	ATA	120	181	0 Normal	132 N	0
48 F	ATA	133	308	0 ST	156 N	2
36 M	ATA	120	166	0 Normal	180 N	0
48 M	NAP	110	211	0 Normal	138 N	0
47 F	ATA	140	257	0 Normal	135 N	1
53 M	ASY	130	182	0 Normal	148 N	0
65 M	ASY	115	0	0 Normal	93 Y	0
32 M	TA	95	0	1 Normal	127 N	0.7
61 M	ASY	105	0	1 Normal	110 Y	1.5
50 M	ASY	145	0	1 Normal	139 Y	0.7
57 M	ASY	110	0	1 ST	131 Y	1.4
51 M	ASY	110	0	1 Normal	92 N	0
47 M	ASY	110	0	1 ST	149 N	2.1
60 M	ASY	160	0	1 Normal	149 N	0.4
55 M	ATA	140	0	0 ST	150 N	0.2
53 M	ASY	125	0	1 Normal	120 N	1.5
62 F	ASY	120	0	1 ST	123 Y	1.7
51 M	ASY	95	0	1 Normal	126 N	2.2
51 F	ASY	120	0	1 Normal	127 Y	1.5
55 M	ASY	115	0	1 Normal	155 N	0.1
53 M	ATA	130	0	0 ST	120 N	0.7
58 M	ASY	115	0	1 Normal	138 N	0.5
57 M	ASY	95	0	1 Normal	182 N	0.7
65 M	ASY	155	0	0 Normal	154 N	1
60 M	ASY	125	0	1 Normal	110 N	0.1
41 M	ASY	125	0	1 Normal	176 N	1.6
34 M	ASY	115	0	1 Normal	154 N	0.2
53 M	ASY	80	0	0 Normal	141 Y	2
74 M	ATA	145	0	1 ST	123 N	1.3
57 M	NAP	105	0	1 Normal	148 N	0.3
56 M	ASY	140	0	1 Normal	121 Y	1.8
61 M	ASY	130	0	1 Normal	77 N	2.5
68 M	ASY	145	0	1 Normal	136 N	1.8
59 M	NAP	125	0	1 Normal	175 N	2.6
63 M	ASY	100	0	1 Normal	109 N	-0.9
38 F	ASY	105	0	1 Normal	166 N	2.8
62 M	ASY	115	0	1 Normal	128 Y	2.5
46 M	ASY	100	0	1 ST	133 N	-2.6
42 M	ASY	105	0	1 Normal	128 Y	-1.5
45 M	NAP	110	0	0 Normal	138 N	-0.1
59 M	ASY	125	0	1 Normal	119 Y	0.9

52 M	ASY	95	0	1 Normal	82 Y	0.8
60 M	ASY	130	0	1 ST	130 Y	1.1
60 M	NAP	115	0	1 Normal	143 N	2.4
56 M	ASY	115	0	1 ST	82 N	-1
38 M	NAP	100	0	0 Normal	179 N	-1.1
40 M	ASY	95	0	1 ST	144 N	0
51 M	ASY	130	0	1 Normal	170 N	-0.7
62 M	TA	120	0	1 LVH	134 N	-0.8
72 M	NAP	160	0	0 LVH	114 N	1.6
63 M	ASY	150	0	1 ST	154 N	3.7
63 M	ASY	140	0	1 LVH	149 N	2
64 F	ASY	95	0	1 Normal	145 N	1.1
43 M	ASY	100	0	1 Normal	122 N	1.5
64 M	ASY	110	0	1 Normal	114 Y	1.3
61 M	ASY	110	0	1 Normal	113 N	1.4
52 M	ASY	130	0	1 Normal	120 N	0
51 M	ASY	120	0	1 Normal	104 N	0
69 M	ASY	135	0	0 Normal	130 N	0
59 M	ASY	120	0	0 Normal	115 N	0
48 M	ASY	115	0	1 Normal	128 N	0
69 M	ASY	137	0	0 ST	104 Y	1.6
36 M	ASY	110	0	1 Normal	125 Y	1
53 M	ASY	120	0	1 Normal	120 N	0
43 M	ASY	140	0	0 ST	140 Y	0.5
56 M	ASY	120	0	0 ST	100 Y	-1
58 M	ASY	130	0	0 ST	100 Y	1
55 M	ASY	120	0	0 ST	92 N	0.3
67 M	TA	145	0	0 LVH	125 N	0
46 M	ASY	115	0	0 Normal	113 Y	1.5
53 M	ATA	120	0	0 Normal	95 N	0
38 M	NAP	115	0	0 Normal	128 Y	0
53 M	NAP	105	0	0 Normal	115 N	0
62 M	NAP	160	0	0 Normal	72 Y	0
47 M	ASY	160	0	0 Normal	124 Y	0
56 M	NAP	155	0	0 ST	99 N	0
56 M	ASY	120	0	0 ST	148 N	0
56 M	NAP	120	0	0 Normal	97 N	0
64 F	ASY	200	0	0 Normal	140 Y	1
61 M	ASY	150	0	0 Normal	117 Y	2
68 M	ASY	135	0	0 ST	120 Y	0
57 M	ASY	140	0	0 Normal	120 Y	2
63 M	ASY	150	0	0 Normal	86 Y	2
60 M	ASY	135	0	0 Normal	63 Y	0.5
66 M	ASY	150	0	0 Normal	108 Y	2
63 M	ASY	185	0	0 Normal	98 Y	0
59 M	ASY	135	0	0 Normal	115 Y	1
61 M	ASY	125	0	0 Normal	105 Y	0

73 F	NAP	160	0	0 ST	121 N	0
47 M	NAP	155	0	0 Normal	118 Y	1
65 M	ASY	160	0	1 ST	122 N	1.2
70 M	ASY	140	0	1 Normal	157 Y	2
50 M	ASY	120	0	0 ST	156 Y	0
60 M	ASY	160	0	0 ST	99 Y	0.5
50 M	ASY	115	0	0 Normal	120 Y	0.5
43 M	ASY	115	0	0 Normal	145 Y	2
38 F	ASY	110	0	0 Normal	156 N	0
54 M	ASY	120	0	0 Normal	155 N	0
61 M	ASY	150	0	0 Normal	105 Y	0
42 M	ASY	145	0	0 Normal	99 Y	0
53 M	ASY	130	0	0 LVH	135 Y	1
55 M	ASY	140	0	0 Normal	83 N	0
61 M	ASY	160	0	1 ST	145 N	1
51 M	ASY	140	0	0 Normal	60 N	0
70 M	ASY	115	0	0 ST	92 Y	0
61 M	ASY	130	0	0 LVH	115 N	0
38 M	ASY	150	0	1 Normal	120 Y	0.7
57 M	ASY	160	0	1 Normal	98 Y	2
38 M	ASY	135	0	1 Normal	150 N	0
62 F	TA	140	0	1 Normal	143 N	0
58 M	ASY	170	0	1 ST	105 Y	0
52 M	ASY	165	0	1 Normal	122 Y	1
61 M	NAP	200	0	1 ST	70 N	0
50 F	ASY	160	0	1 Normal	110 N	0
51 M	ASY	130	0	1 ST	163 N	0
65 M	ASY	145	0	1 ST	67 N	0.7
52 M	ASY	135	0	1 Normal	128 Y	2
47 M	NAP	110	0	1 Normal	120 Y	0
35 M	ASY	120	0	1 Normal	130 Y	1.2
57 M	ASY	140	0	1 Normal	100 Y	0
62 M	ASY	115	0	1 Normal	72 Y	-0.5
59 M	ASY	110	0	1 Normal	94 N	0
53 M	NAP	160	0	1 LVH	122 Y	0
62 M	ASY	150	0	1 ST	78 N	2
54 M	ASY	180	0	1 Normal	150 N	1.5
56 M	ASY	125	0	1 Normal	103 Y	1
56 M	NAP	125	0	1 Normal	98 N	-2
54 M	ASY	130	0	1 Normal	110 Y	3
66 F	ASY	155	0	1 Normal	90 N	0
63 M	ASY	140	260	0 ST	112 Y	3
44 M	ASY	130	209	0 ST	127 N	0
60 M	ASY	132	218	0 ST	140 Y	1.5
55 M	ASY	142	228	0 ST	149 Y	2.5
66 M	NAP	110	213	1 LVH	99 Y	1.3
66 M	NAP	120	0	0 ST	120 N	-0.5

65 M	ASY	150	236	1 ST	105 Y	0
60 M	NAP	180	0	0 ST	140 Y	1.5
60 M	NAP	120	0	1 Normal	141 Y	2
60 M	ATA	160	267	1 ST	157 N	0.5
56 M	ATA	126	166	0 ST	140 N	0
59 M	ASY	140	0	0 ST	117 Y	1
62 M	ASY	110	0	0 Normal	120 Y	0.5
63 M	NAP	133	0	0 LVH	120 Y	1
57 M	ASY	128	0	1 ST	148 Y	1
62 M	ASY	120	220	0 ST	86 N	0
63 M	ASY	170	177	0 Normal	84 Y	2.5
46 M	ASY	110	236	0 Normal	125 Y	2
63 M	ASY	126	0	0 ST	120 N	1.5
60 M	ASY	152	0	0 ST	118 Y	0
58 M	ASY	116	0	0 Normal	124 N	1
64 M	ASY	120	0	1 ST	106 N	2
63 M	NAP	130	0	0 ST	111 Y	0
74 M	NAP	138	0	0 Normal	116 N	0.2
52 M	NAP	128	0	0 ST	180 N	3
69 M	ASY	130	0	1 ST	129 N	1
51 M	ASY	128	0	1 ST	125 Y	1.2
60 M	ASY	130	186	1 ST	140 Y	0.5
56 M	ASY	120	100	0 Normal	120 Y	1.5
55 M	NAP	136	228	0 ST	124 Y	1.6
54 M	ASY	130	0	0 ST	117 Y	1.4
77 M	ASY	124	171	0 ST	110 Y	2
63 M	ASY	160	230	1 Normal	105 Y	1
55 M	NAP	0	0	0 Normal	155 N	1.5
52 M	NAP	122	0	0 Normal	110 Y	2
64 M	ASY	144	0	0 ST	122 Y	1
60 M	ASY	140	281	0 ST	118 Y	1.5
60 M	ASY	120	0	0 Normal	133 Y	2
58 M	ASY	136	203	1 Normal	123 Y	1.2
59 M	ASY	154	0	0 ST	131 Y	1.5
61 M	NAP	120	0	0 Normal	80 Y	0
40 M	ASY	125	0	1 Normal	165 N	0
61 M	ASY	134	0	1 ST	86 N	1.5
41 M	ASY	104	0	0 ST	111 N	0
57 M	ASY	139	277	1 ST	118 Y	1.9
63 M	ASY	136	0	0 Normal	84 Y	0
59 M	ASY	122	233	0 Normal	117 Y	1.3
51 M	ASY	128	0	0 Normal	107 N	0
59 M	NAP	131	0	0 Normal	128 Y	2
42 M	NAP	134	240	0 Normal	160 N	0
55 M	NAP	120	0	0 ST	125 Y	2.5
63 F	ATA	132	0	0 Normal	130 N	0.1
62 M	ASY	152	153	0 ST	97 Y	1.6

56 M	ATA	124	224	1 Normal	161 N	2
53 M	ASY	126	0	0 Normal	106 N	0
68 M	ASY	138	0	0 Normal	130 Y	3
53 M	ASY	154	0	1 ST	140 Y	1.5
60 M	NAP	141	316	1 ST	122 Y	1.7
62 M	ATA	131	0	0 Normal	130 N	0.1
59 M	ASY	178	0	1 LVH	120 Y	0
51 M	ASY	132	218	1 LVH	139 N	0.1
61 M	ASY	110	0	1 Normal	108 Y	2
57 M	ASY	130	311	1 ST	148 Y	2
56 M	NAP	170	0	0 LVH	123 Y	2.5
58 M	ATA	126	0	1 Normal	110 Y	2
69 M	NAP	140	0	1 ST	118 N	2.5
67 M	TA	142	270	1 Normal	125 N	2.5
58 M	ASY	120	0	0 LVH	106 Y	1.5
65 M	ASY	134	0	0 Normal	112 Y	1.1
63 M	ATA	139	217	1 ST	128 Y	1.2
55 M	ATA	110	214	1 ST	180 N	0.4
57 M	ASY	140	214	0 ST	144 Y	2
65 M	TA	140	252	0 Normal	135 N	0.3
54 M	ASY	136	220	0 Normal	140 Y	3
72 M	NAP	120	214	0 Normal	102 Y	1
75 M	ASY	170	203	1 ST	108 N	0
49 M	TA	130	0	0 ST	145 N	3
51 M	NAP	137	339	0 Normal	127 Y	1.7
60 M	ASY	142	216	0 Normal	110 Y	2.5
64 F	ASY	142	276	0 Normal	140 Y	1
58 M	ASY	132	458	1 Normal	69 N	1
61 M	ASY	146	241	0 Normal	148 Y	3
67 M	ASY	160	384	1 ST	130 Y	0
62 M	ASY	135	297	0 Normal	130 Y	1
65 M	ASY	136	248	0 Normal	140 Y	4
63 M	ASY	130	308	0 Normal	138 Y	2
69 M	ASY	140	208	0 ST	140 Y	2
51 M	ASY	132	227	1 ST	138 N	0.2
62 M	ASY	158	210	1 Normal	112 Y	3
55 M	NAP	136	245	1 ST	131 Y	1.2
75 M	ASY	136	225	0 Normal	112 Y	3
40 M	NAP	106	240	0 Normal	80 Y	0
67 M	ASY	120	0	1 Normal	150 N	1.5
58 M	ASY	110	198	0 Normal	110 N	0
60 M	ASY	136	195	0 Normal	126 N	0.3
63 M	ASY	160	267	1 ST	88 Y	2
35 M	NAP	123	161	0 ST	153 N	-0.1
62 M	TA	112	258	0 ST	150 Y	1.3
43 M	ASY	122	0	0 Normal	120 N	0.5
63 M	NAP	130	0	1 ST	160 N	3

68 M	NAP	150	195	1 Normal	132 N	0
65 M	ASY	150	235	0 Normal	120 Y	1.5
48 M	NAP	102	0	1 ST	110 Y	1
63 M	ASY	96	305	0 ST	121 Y	1
64 M	ASY	130	223	0 ST	128 N	0.5
61 M	ASY	120	282	0 ST	135 Y	4
50 M	ASY	144	349	0 LVH	120 Y	1
59 M	ASY	124	160	0 Normal	117 Y	1
55 M	ASY	150	160	0 ST	150 N	0
45 M	NAP	130	236	0 Normal	144 N	0.1
65 M	ASY	144	312	0 LVH	113 Y	1.7
61 M	ATA	139	283	0 Normal	135 N	0.3
49 M	NAP	131	142	0 Normal	127 Y	1.5
72 M	ASY	143	211	0 Normal	109 Y	1.4
50 M	ASY	133	218	0 Normal	128 Y	1.1
64 M	ASY	143	306	1 ST	115 Y	1.8
55 M	ASY	116	186	1 ST	102 N	0
63 M	ASY	110	252	0 ST	140 Y	2
59 M	ASY	125	222	0 Normal	135 Y	2.5
56 M	ASY	130	0	0 LVH	122 Y	1
62 M	NAP	133	0	1 ST	119 Y	1.2
74 M	ASY	150	258	1 ST	130 Y	4
54 M	ASY	130	202	1 Normal	112 Y	2
57 M	ASY	110	197	0 LVH	100 N	0
62 M	NAP	138	204	0 ST	122 Y	1.2
76 M	NAP	104	113	0 LVH	120 N	3.5
54 F	ASY	138	274	0 Normal	105 Y	1.5
70 M	ASY	170	192	0 ST	129 Y	3
61 F	ATA	140	298	1 Normal	120 Y	0
48 M	ASY	132	272	0 ST	139 N	0.2
48 M	NAP	132	220	1 ST	162 N	0
61 M	TA	142	200	1 ST	100 N	1.5
66 M	ASY	112	261	0 Normal	140 N	1.5
68 M	TA	139	181	1 ST	135 N	0.2
55 M	ASY	172	260	0 Normal	73 N	2
62 M	NAP	120	220	0 LVH	86 N	0
71 M	NAP	144	221	0 Normal	108 Y	1.8
74 M	TA	145	216	1 Normal	116 Y	1.8
53 M	NAP	155	175	1 ST	160 N	0.3
58 M	NAP	150	219	0 ST	118 Y	0
75 M	ASY	160	310	1 Normal	112 Y	2
56 M	NAP	137	208	1 ST	122 Y	1.8
58 M	NAP	137	232	0 ST	124 Y	1.4
64 M	ASY	134	273	0 Normal	102 Y	4
54 M	NAP	133	203	0 ST	137 N	0.2
54 M	ATA	132	182	0 ST	141 N	0.1
59 M	ASY	140	274	0 Normal	154 Y	2

55 M	ASY	135	204	1 ST	126 Y	1.1
57 M	ASY	144	270	1 ST	160 Y	2
61 M	ASY	141	292	0 ST	115 Y	1.7
41 M	ASY	150	171	0 Normal	128 Y	1.5
71 M	ASY	130	221	0 ST	115 Y	0
38 M	ASY	110	289	0 Normal	105 Y	1.5
55 M	ASY	158	217	0 Normal	110 Y	2.5
56 M	ASY	128	223	0 ST	119 Y	2
69 M	ASY	140	110	1 Normal	109 Y	1.5
64 M	ASY	150	193	0 ST	135 Y	0.5
72 M	ASY	160	123	1 LVH	130 N	1.5
69 M	ASY	142	210	1 ST	112 Y	1.5
56 M	ASY	137	282	1 Normal	126 Y	1.2
62 M	ASY	139	170	0 ST	120 Y	3
67 M	ASY	146	369	0 Normal	110 Y	1.9
57 M	ASY	156	173	0 LVH	119 Y	3
69 M	ASY	145	289	1 ST	110 Y	1.8
51 M	ASY	131	152	1 LVH	130 Y	1
48 M	ASY	140	208	0 Normal	159 Y	1.5
69 M	ASY	122	216	1 LVH	84 Y	0
69 M	NAP	142	271	0 LVH	126 N	0.3
64 M	ASY	141	244	1 ST	116 Y	1.5
57 M	ATA	180	285	1 ST	120 N	0.8
53 M	ASY	124	243	0 Normal	122 Y	2
37 M	NAP	118	240	0 LVH	165 N	1
67 M	ASY	140	219	0 ST	122 Y	2
74 M	NAP	140	237	1 Normal	94 N	0
63 M	ATA	136	165	0 ST	133 N	0.2
58 M	ASY	100	213	0 ST	110 N	0
61 M	ASY	190	287	1 LVH	150 Y	2
64 M	ASY	130	258	1 LVH	130 N	0
58 M	ASY	160	256	1 LVH	113 Y	1
60 M	ASY	130	186	1 LVH	140 Y	0.5
57 M	ASY	122	264	0 LVH	100 N	0
55 M	NAP	133	185	0 ST	136 N	0.2
55 M	ASY	120	226	0 LVH	127 Y	1.7
56 M	ASY	130	203	1 Normal	98 N	1.5
57 M	ASY	130	207	0 ST	96 Y	1
61 M	NAP	140	284	0 Normal	123 Y	1.3
61 M	NAP	120	337	0 Normal	98 Y	0
74 M	ASY	155	310	0 Normal	112 Y	1.5
68 M	NAP	134	254	1 Normal	151 Y	0
51 F	ASY	114	258	1 LVH	96 N	1
62 M	ASY	160	254	1 ST	108 Y	3
53 M	ASY	144	300	1 ST	128 Y	1.5
62 M	ASY	158	170	0 ST	138 Y	0
46 M	ASY	134	310	0 Normal	126 N	0

54 F	ASY	127	333	1 ST	154 N	0
62 M	TA	135	139	0 ST	137 N	0.2
55 M	ASY	122	223	1 ST	100 N	0
58 M	ASY	140	385	1 LVH	135 N	0.3
62 M	ATA	120	254	0 LVH	93 Y	0
70 M	ASY	130	322	0 LVH	109 N	2.4
67 F	NAP	115	564	0 LVH	160 N	1.6
57 M	ATA	124	261	0 Normal	141 N	0.3
64 M	ASY	128	263	0 Normal	105 Y	0.2
74 F	ATA	120	269	0 LVH	121 Y	0.2
65 M	ASY	120	177	0 Normal	140 N	0.4
56 M	NAP	130	256	1 LVH	142 Y	0.6
59 M	ASY	110	239	0 LVH	142 Y	1.2
60 M	ASY	140	293	0 LVH	170 N	1.2
63 F	ASY	150	407	0 LVH	154 N	4
59 M	ASY	135	234	0 Normal	161 N	0.5
53 M	ASY	142	226	0 LVH	111 Y	0
44 M	NAP	140	235	0 LVH	180 N	0
61 M	TA	134	234	0 Normal	145 N	2.6
57 F	ASY	128	303	0 LVH	159 N	0
71 F	ASY	112	149	0 Normal	125 N	1.6
46 M	ASY	140	311	0 Normal	120 Y	1.8
53 M	ASY	140	203	1 LVH	155 Y	3.1
64 M	TA	110	211	0 LVH	144 Y	1.8
40 M	TA	140	199	0 Normal	178 Y	1.4
67 M	ASY	120	229	0 LVH	129 Y	2.6
48 M	ATA	130	245	0 LVH	180 N	0.2
43 M	ASY	115	303	0 Normal	181 N	1.2
47 M	ASY	112	204	0 Normal	143 N	0.1
54 F	ATA	132	288	1 LVH	159 Y	0
48 F	NAP	130	275	0 Normal	139 N	0.2
46 F	ASY	138	243	0 LVH	152 Y	0
51 F	NAP	120	295	0 LVH	157 N	0.6
58 M	NAP	112	230	0 LVH	165 N	2.5
71 F	NAP	110	265	1 LVH	130 N	0
57 M	NAP	128	229	0 LVH	150 N	0.4
66 M	ASY	160	228	0 LVH	138 N	2.3
37 F	NAP	120	215	0 Normal	170 N	0
59 M	ASY	170	326	0 LVH	140 Y	3.4
50 M	ASY	144	200	0 LVH	126 Y	0.9
48 M	ASY	130	256	1 LVH	150 Y	0
61 M	ASY	140	207	0 LVH	138 Y	1.9
59 M	TA	160	273	0 LVH	125 N	0
42 M	NAP	130	180	0 Normal	150 N	0
48 M	ASY	122	222	0 LVH	186 N	0
40 M	ASY	152	223	0 Normal	181 N	0
62 F	ASY	124	209	0 Normal	163 N	0

44 M	NAP	130	233	0 Normal	179 Y	0.4
46 M	ATA	101	197	1 Normal	156 N	0
59 M	NAP	126	218	1 Normal	134 N	2.2
58 M	NAP	140	211	1 LVH	165 N	0
49 M	NAP	118	149	0 LVH	126 N	0.8
44 M	ASY	110	197	0 LVH	177 N	0
66 M	ATA	160	246	0 Normal	120 Y	0
65 F	ASY	150	225	0 LVH	114 N	1
42 M	ASY	136	315	0 Normal	125 Y	1.8
52 M	ATA	128	205	1 Normal	184 N	0
65 F	NAP	140	417	1 LVH	157 N	0.8
63 F	ATA	140	195	0 Normal	179 N	0
45 F	ATA	130	234	0 LVH	175 N	0.6
41 F	ATA	105	198	0 Normal	168 N	0
61 M	ASY	138	166	0 LVH	125 Y	3.6
60 F	NAP	120	178	1 Normal	96 N	0
59 F	ASY	174	249	0 Normal	143 Y	0
62 M	ATA	120	281	0 LVH	103 N	1.4
57 M	NAP	150	126	1 Normal	173 N	0.2
51 F	ASY	130	305	0 Normal	142 Y	1.2
44 M	NAP	120	226	0 Normal	169 N	0
60 F	TA	150	240	0 Normal	171 N	0.9
63 M	TA	145	233	1 LVH	150 N	2.3
57 M	ASY	150	276	0 LVH	112 Y	0.6
51 M	ASY	140	261	0 LVH	186 Y	0
58 F	ATA	136	319	1 LVH	152 N	0
44 F	NAP	118	242	0 Normal	149 N	0.3
47 M	NAP	108	243	0 Normal	152 N	0
61 M	ASY	120	260	0 Normal	140 Y	3.6
57 F	ASY	120	354	0 Normal	163 Y	0.6
70 M	ATA	156	245	0 LVH	143 N	0
76 F	NAP	140	197	0 ST	116 N	1.1
67 F	ASY	106	223	0 Normal	142 N	0.3
45 M	ASY	142	309	0 LVH	147 Y	0
45 M	ASY	104	208	0 LVH	148 Y	3
39 F	NAP	94	199	0 Normal	179 N	0
42 F	NAP	120	209	0 Normal	173 N	0
56 M	ATA	120	236	0 Normal	178 N	0.8
58 M	ASY	146	218	0 Normal	105 N	2
35 M	ASY	120	198	0 Normal	130 Y	1.6
58 M	ASY	150	270	0 LVH	111 Y	0.8
41 M	NAP	130	214	0 LVH	168 N	2
57 M	ASY	110	201	0 Normal	126 Y	1.5
42 M	TA	148	244	0 LVH	178 N	0.8
62 M	ATA	128	208	1 LVH	140 N	0
59 M	TA	178	270	0 LVH	145 N	4.2
41 F	ATA	126	306	0 Normal	163 N	0

50 M	ASY	150	243	0 LVH	128 N	2.6
59 M	ATA	140	221	0 Normal	164 Y	0
61 F	ASY	130	330	0 LVH	169 N	0
54 M	ASY	124	266	0 LVH	109 Y	2.2
54 M	ASY	110	206	0 LVH	108 Y	0
52 M	ASY	125	212	0 Normal	168 N	1
47 M	ASY	110	275	0 LVH	118 Y	1
66 M	ASY	120	302	0 LVH	151 N	0.4
58 M	ASY	100	234	0 Normal	156 N	0.1
64 F	NAP	140	313	0 Normal	133 N	0.2
50 F	ATA	120	244	0 Normal	162 N	1.1
44 F	NAP	108	141	0 Normal	175 N	0.6
67 M	ASY	120	237	0 Normal	71 N	1
49 F	ASY	130	269	0 Normal	163 N	0
57 M	ASY	165	289	1 LVH	124 N	1
63 M	ASY	130	254	0 LVH	147 N	1.4
48 M	ASY	124	274	0 LVH	166 N	0.5
51 M	NAP	100	222	0 Normal	143 Y	1.2
60 F	ASY	150	258	0 LVH	157 N	2.6
59 M	ASY	140	177	0 Normal	162 Y	0
45 F	ATA	112	160	0 Normal	138 N	0
55 F	ASY	180	327	0 ST	117 Y	3.4
41 M	ATA	110	235	0 Normal	153 N	0
60 F	ASY	158	305	0 LVH	161 N	0
54 F	NAP	135	304	1 Normal	170 N	0
42 M	ATA	120	295	0 Normal	162 N	0
49 F	ATA	134	271	0 Normal	162 N	0
46 M	ASY	120	249	0 LVH	144 N	0.8
56 F	ASY	200	288	1 LVH	133 Y	4
66 F	TA	150	226	0 Normal	114 N	2.6
56 M	ASY	130	283	1 LVH	103 Y	1.6
49 M	NAP	120	188	0 Normal	139 N	2
54 M	ASY	122	286	0 LVH	116 Y	3.2
57 M	ASY	152	274	0 Normal	88 Y	1.2
65 F	NAP	160	360	0 LVH	151 N	0.8
54 M	NAP	125	273	0 LVH	152 N	0.5
54 F	NAP	160	201	0 Normal	163 N	0
62 M	ASY	120	267	0 Normal	99 Y	1.8
52 F	NAP	136	196	0 LVH	169 N	0.1
52 M	ATA	134	201	0 Normal	158 N	0.8
60 M	ASY	117	230	1 Normal	160 Y	1.4
63 F	ASY	108	269	0 Normal	169 Y	1.8
66 M	ASY	112	212	0 LVH	132 Y	0.1
42 M	ASY	140	226	0 Normal	178 N	0
64 M	ASY	120	246	0 LVH	96 Y	2.2
54 M	NAP	150	232	0 LVH	165 N	1.6
46 F	NAP	142	177	0 LVH	160 Y	1.4

67 F	NAP	152	277	0 Normal	172 N	0
56 M	ASY	125	249	1 LVH	144 Y	1.2
34 F	ATA	118	210	0 Normal	192 N	0.7
57 M	ASY	132	207	0 Normal	168 Y	0
64 M	ASY	145	212	0 LVH	132 N	2
59 M	ASY	138	271	0 LVH	182 N	0
50 M	NAP	140	233	0 Normal	163 N	0.6
51 M	TA	125	213	0 LVH	125 Y	1.4
54 M	ATA	192	283	0 LVH	195 N	0
53 M	ASY	123	282	0 Normal	95 Y	2
52 M	ASY	112	230	0 Normal	160 N	0
40 M	ASY	110	167	0 LVH	114 Y	2
58 M	NAP	132	224	0 LVH	173 N	3.2
41 F	NAP	112	268	0 LVH	172 Y	0
41 M	NAP	112	250	0 Normal	179 N	0
50 F	NAP	120	219	0 Normal	158 N	1.6
54 F	NAP	108	267	0 LVH	167 N	0
64 F	ASY	130	303	0 Normal	122 N	2
51 F	NAP	130	256	0 LVH	149 N	0.5
46 F	ATA	105	204	0 Normal	172 N	0
55 M	ASY	140	217	0 Normal	111 Y	5.6
45 M	ATA	128	308	0 LVH	170 N	0
56 M	TA	120	193	0 LVH	162 N	1.9
66 F	ASY	178	228	1 Normal	165 Y	1
38 M	TA	120	231	0 Normal	182 Y	3.8
62 F	ASY	150	244	0 Normal	154 Y	1.4
55 M	ATA	130	262	0 Normal	155 N	0
58 M	ASY	128	259	0 LVH	130 Y	3
43 M	ASY	110	211	0 Normal	161 N	0
64 F	ASY	180	325	0 Normal	154 Y	0
50 F	ASY	110	254	0 LVH	159 N	0
53 M	NAP	130	197	1 LVH	152 N	1.2
45 F	ASY	138	236	0 LVH	152 Y	0.2
65 M	TA	138	282	1 LVH	174 N	1.4
69 M	TA	160	234	1 LVH	131 N	0.1
69 M	NAP	140	254	0 LVH	146 N	2
67 M	ASY	100	299	0 LVH	125 Y	0.9
68 F	NAP	120	211	0 LVH	115 N	1.5
34 M	TA	118	182	0 LVH	174 N	0
62 F	ASY	138	294	1 Normal	106 N	1.9
51 M	ASY	140	298	0 Normal	122 Y	4.2
46 M	NAP	150	231	0 Normal	147 N	3.6
67 M	ASY	125	254	1 Normal	163 N	0.2
50 M	NAP	129	196	0 Normal	163 N	0
42 M	NAP	120	240	1 Normal	194 N	0.8
56 F	ASY	134	409	0 LVH	150 Y	1.9
41 M	ASY	110	172	0 LVH	158 N	0

42 F	ASY	102	265	0 LVH	122 N	0.6
53 M	NAP	130	246	1 LVH	173 N	0
43 M	NAP	130	315	0 Normal	162 N	1.9
56 M	ASY	132	184	0 LVH	105 Y	2.1
52 M	ASY	108	233	1 Normal	147 N	0.1
62 F	ASY	140	394	0 LVH	157 N	1.2
70 M	NAP	160	269	0 Normal	112 Y	2.9
54 M	ASY	140	239	0 Normal	160 N	1.2
70 M	ASY	145	174	0 Normal	125 Y	2.6
54 M	ATA	108	309	0 Normal	156 N	0
35 M	ASY	126	282	0 LVH	156 Y	0
48 M	NAP	124	255	1 Normal	175 N	0
55 F	ATA	135	250	0 LVH	161 N	1.4
58 F	ASY	100	248	0 LVH	122 N	1
54 F	NAP	110	214	0 Normal	158 N	1.6
69 F	TA	140	239	0 Normal	151 N	1.8
77 M	ASY	125	304	0 LVH	162 Y	0
68 M	NAP	118	277	0 Normal	151 N	1
58 M	ASY	125	300	0 LVH	171 N	0
60 M	ASY	125	258	0 LVH	141 Y	2.8
51 M	ASY	140	299	0 Normal	173 Y	1.6
55 M	ASY	160	289	0 LVH	145 Y	0.8
52 M	TA	152	298	1 Normal	178 N	1.2
60 F	NAP	102	318	0 Normal	160 N	0
58 M	NAP	105	240	0 LVH	154 Y	0.6
64 M	NAP	125	309	0 Normal	131 Y	1.8
37 M	NAP	130	250	0 Normal	187 N	3.5
59 M	TA	170	288	0 LVH	159 N	0.2
51 M	NAP	125	245	1 LVH	166 N	2.4
43 F	NAP	122	213	0 Normal	165 N	0.2
58 M	ASY	128	216	0 LVH	131 Y	2.2
29 M	ATA	130	204	0 LVH	202 N	0
41 F	ATA	130	204	0 LVH	172 N	1.4
63 F	NAP	135	252	0 LVH	172 N	0
51 M	NAP	94	227	0 Normal	154 Y	0
54 M	NAP	120	258	0 LVH	147 N	0.4
44 M	ATA	120	220	0 Normal	170 N	0
54 M	ASY	110	239	0 Normal	126 Y	2.8
65 M	ASY	135	254	0 LVH	127 N	2.8
57 M	NAP	150	168	0 Normal	174 N	1.6
63 M	ASY	130	330	1 LVH	132 Y	1.8
35 F	ASY	138	183	0 Normal	182 N	1.4
41 M	ATA	135	203	0 Normal	132 N	0
62 F	NAP	130	263	0 Normal	97 N	1.2
43 F	ASY	132	341	1 LVH	136 Y	3
58 F	TA	150	283	1 LVH	162 N	1
52 M	TA	118	186	0 LVH	190 N	0

61 F	ASY	145	307	0 LVH	146 Y	1
39 M	ASY	118	219	0 Normal	140 N	1.2
45 M	ASY	115	260	0 LVH	185 N	0
52 M	ASY	128	255	0 Normal	161 Y	0
62 M	NAP	130	231	0 Normal	146 N	1.8
62 F	ASY	160	164	0 LVH	145 N	6.2
53 F	ASY	138	234	0 LVH	160 N	0
43 M	ASY	120	177	0 LVH	120 Y	2.5
47 M	NAP	138	257	0 LVH	156 N	0
52 M	ATA	120	325	0 Normal	172 N	0.2
68 M	NAP	180	274	1 LVH	150 Y	1.6
39 M	NAP	140	321	0 LVH	182 N	0
53 F	ASY	130	264	0 LVH	143 N	0.4
62 F	ASY	140	268	0 LVH	160 N	3.6
51 F	NAP	140	308	0 LVH	142 N	1.5
60 M	ASY	130	253	0 Normal	144 Y	1.4
65 M	ASY	110	248	0 LVH	158 N	0.6
65 F	NAP	155	269	0 Normal	148 N	0.8
60 M	NAP	140	185	0 LVH	155 N	3
60 M	ASY	145	282	0 LVH	142 Y	2.8
54 M	ASY	120	188	0 Normal	113 N	1.4
44 M	ATA	130	219	0 LVH	188 N	0
44 M	ASY	112	290	0 LVH	153 N	0
51 M	NAP	110	175	0 Normal	123 N	0.6
59 M	NAP	150	212	1 Normal	157 N	1.6
71 F	ATA	160	302	0 Normal	162 N	0.4
61 M	NAP	150	243	1 Normal	137 Y	1
55 M	ASY	132	353	0 Normal	132 Y	1.2
64 M	NAP	140	335	0 Normal	158 N	0
43 M	ASY	150	247	0 Normal	171 N	1.5
58 F	NAP	120	340	0 Normal	172 N	0
60 M	ASY	130	206	0 LVH	132 Y	2.4
58 M	ATA	120	284	0 LVH	160 N	1.8
49 M	ATA	130	266	0 Normal	171 N	0.6
48 M	ATA	110	229	0 Normal	168 N	1
52 M	NAP	172	199	1 Normal	162 N	0.5
44 M	ATA	120	263	0 Normal	173 N	0
56 F	ATA	140	294	0 LVH	153 N	1.3
57 M	ASY	140	192	0 Normal	148 N	0.4
67 M	ASY	160	286	0 LVH	108 Y	1.5
53 F	NAP	128	216	0 LVH	115 N	0
52 M	NAP	138	223	0 Normal	169 N	0
43 M	ASY	132	247	1 LVH	143 Y	0.1
52 M	ASY	128	204	1 Normal	156 Y	1
59 M	TA	134	204	0 Normal	162 N	0.8
64 M	TA	170	227	0 LVH	155 N	0.6
66 F	NAP	146	278	0 LVH	152 N	0

39 F	NAP	138	220	0 Normal	152 N	0
57 M	ATA	154	232	0 LVH	164 N	0
58 F	ASY	130	197	0 Normal	131 N	0.6
57 M	ASY	110	335	0 Normal	143 Y	3
47 M	NAP	130	253	0 Normal	179 N	0
55 F	ASY	128	205	0 ST	130 Y	2
35 M	ATA	122	192	0 Normal	174 N	0
61 M	ASY	148	203	0 Normal	161 N	0
58 M	ASY	114	318	0 ST	140 N	4.4
58 F	ASY	170	225	1 LVH	146 Y	2.8
58 M	ATA	125	220	0 Normal	144 N	0.4
56 M	ATA	130	221	0 LVH	163 N	0
56 M	ATA	120	240	0 Normal	169 N	0
67 M	NAP	152	212	0 LVH	150 N	0.8
55 F	ATA	132	342	0 Normal	166 N	1.2
44 M	ASY	120	169	0 Normal	144 Y	2.8
63 M	ASY	140	187	0 LVH	144 Y	4
63 F	ASY	124	197	0 Normal	136 Y	0
41 M	ATA	120	157	0 Normal	182 N	0
59 M	ASY	164	176	1 LVH	90 N	1
57 F	ASY	140	241	0 Normal	123 Y	0.2
45 M	TA	110	264	0 Normal	132 N	1.2
68 M	ASY	144	193	1 Normal	141 N	3.4
57 M	ASY	130	131	0 Normal	115 Y	1.2
57 F	ATA	130	236	0 LVH	174 N	0
38 M	NAP	138	175	0 Normal	173 N	0

ST_Slope	HeartDisease
Up	0
Flat	1
Up	0
Flat	1
Up	0
Up	0
Up	0
Up	0
Flat	1
Up	0
Up	0
Flat	1
Up	0
Flat	1
Up	0
Flat	0
Flat	1
Up	0
Flat	1
Flat	1
Up	0
Flat	0
Up	0
Flat	1
Up	0
Up	0
Flat	0
Up	0
Up	0
Up	0
Flat	1
Up	0
Flat	1
Flat	1
Up	0
Up	0
Flat	1
Up	0
Up	0
Flat	0
Up	0
Flat	1
Up	0
Up	0
Flat	1
Flat	0

Up	0
Up	0
Flat	0
Flat	1
Flat	1
Flat	1
Up	0
Up	0
Flat	0
Up	0
Flat	1
Flat	1
Up	0
Flat	1
Up	0
Up	0
Up	0
Flat	1
Up	0
Up	0
Up	0
Up	0
Flat	1
Up	0
Flat	1
Up	0
Flat	1
Up	0
Flat	1
Up	0
Up	0
Flat	1
Up	0
Up	0
Flat	1
Up	0
Flat	1
Flat	1
Flat	1
Flat	0
Flat	1
Flat	0
Up	0
Up	0
Up	0

Flat	1
Up	0
Flat	1
Up	0
Up	0
Up	0
Up	0
Flat	1
Up	0
Flat	1
Flat	1
Flat	1
Up	0
Up	0
Up	0
Up	0
Up	0
Flat	0
Flat	1
Up	0
Up	0
Up	0
Flat	1
Flat	1
Flat	1
Up	0
Flat	1
Flat	1
Up	0
Up	0
Flat	1
Up	0
Up	0
Up	0
Up	0
Up	0
Flat	0
Up	0
Flat	1
Flat	1
Flat	1
Flat	0
Flat	1
Up	0
Up	0
Flat	1
Flat	1

Flat	1
Flat	1
Flat	1
Up	0
Flat	1
Up	0
Up	0
Up	0
Up	0
Flat	1
Up	0
Up	0
Up	0
Up	0
Flat	1
Flat	1
Up	0
Flat	1
Up	0
Flat	1
Flat	1
Up	0
Up	0
Up	0
Flat	1
Flat	1
Up	0
Up	0
Up	0
Up	0
Up	0
Up	0
Flat	1
Flat	1
Flat	1
Up	0
Up	0
Up	0
Flat	1
Up	0
Flat	1
Flat	0
Up	0
Flat	1
Up	0

Up	0
Flat	0
Flat	1
Flat	1
Flat	1
Flat	1
Up	0
Flat	1
Flat	1
Up	0
Flat	1
Up	0
Flat	1
Down	1
Flat	1
Flat	1
Flat	1
Flat	1
Up	0
Up	0
Flat	1
Up	0
Up	0
Up	0
Up	0
Up	0
Up	0
Up	0
Flat	1
Flat	1
Flat	1
Up	0
Flat	1
Up	0
Flat	1
Flat	0
Up	0
Up	0
Flat	1
Up	0
Up	0
Up	0
Flat	1
Flat	1
Flat	0
Up	0
Up	0

Flat	1
Up	0
Up	0
Up	0
Up	0
Up	0
Up	0
Up	0
Up	0
Up	0
Up	0
Up	0
Flat	1
Up	1
Up	1
Flat	1
Up	1
Flat	1
Up	1
Flat	1
Up	0
Up	1
Down	1
Flat	1
Up	1
Flat	1
Down	0
Up	1
Down	1
Up	0
Up	1
Up	1
Up	1
Down	0
Up	1
Flat	1
Up	1
Flat	1
Up	1
Flat	1
Flat	1
Up	1
Down	1
Flat	1
Down	1
Up	0
Up	1

Flat	1
Down	1
Up	1
Up	1
Up	0
Up	1
Up	1
Flat	1
Flat	0
Up	1
Up	1
Down	1
Down	1
Down	1
Flat	1
Flat	1
Flat	1
Flat	1
Flat	1
Flat	1
Flat	1
Flat	1
Flat	1
Flat	1
Up	1
Down	1
Flat	1
Up	1
Flat	1
Flat	1
Flat	1
Flat	1
Flat	1
Flat	1
Flat	1
Flat	1
Flat	1
Flat	1
Flat	0
Flat	1
Flat	1
Up	1
Flat	1
Flat	1
Up	1
Flat	1
Up	1
Flat	1
Down	1

[illegible]

Flat	1
Flat	0
Up	1
Flat	1
Up	0
Flat	1
Flat	1
Flat	1
Flat	1
Up	0
Down	1
Flat	1
Down	0
Up	0
Up	1
Flat	1
Flat	1
Up	0
Up	1
Flat	1
Flat	1
Flat	1
Flat	1
Flat	1
Flat	1
Up	1
Flat	1
Flat	1
Down	1
Flat	1
Flat	1
Up	0
Flat	1
Up	0
Flat	1
Flat	1
Flat	1
Up	0
Flat	1
Flat	1
Down	1
Up	0
Down	1
Up	0
Flat	1
Up	0
Up	1

Flat	0
Flat	1
Flat	1
Flat	1
Flat	1
Up	0
Flat	1
Up	0
Down	1
Flat	1
Flat	1
Flat	1
Down	1
Up	1
Down	1
Flat	1
Flat	1
Up	0
Flat	1
Up	0
Flat	1
Flat	1
Flat	1
Flat	1
Flat	1
Flat	1
Flat	1
Down	0
Down	1
Flat	1
Flat	1
Down	1
Flat	1
Flat	1
Up	0
Down	1
Flat	1
Flat	1
Up	0
Down	1
Flat	1
Up	0
Flat	1
Up	0
Flat	1
Up	1
Flat	0

Flat	1
Flat	1
Down	1
Up	1
Flat	0
Down	1
Up	1
Flat	1
Up	0
Up	0
Flat	1
Up	0
Flat	1
Flat	1
Flat	1
Flat	1
Flat	1
Flat	1
Down	1
Flat	1
Flat	1
Down	1
Flat	1
Up	0
Flat	1
Down	1
Flat	1
Down	1
Up	0
Up	0
Flat	1
Down	1
Up	1
Up	0
Flat	1
Up	0
Flat	1
Flat	1
Up	0
Flat	1
Down	0
Flat	1
Flat	1
Down	1
Up	0
Up	0
Flat	0

Flat	1
Flat	1
Flat	1
Flat	0
Flat	1
Down	1
Flat	1
Down	1
Flat	1
Flat	1
Flat	1
Flat	1
Flat	1
Flat	1
Flat	1
Down	1
Flat	1
Flat	1
Up	1
Flat	1
Up	0
Flat	1
Flat	1
Flat	1
Flat	0
Flat	1
Flat	1
Up	0
Up	0
Down	1
Flat	1
Up	1
Flat	1
Flat	1
Up	0
Down	1
Flat	1
Flat	0
Flat	1
Flat	1
Down	1
Up	0
Up	0
Flat	1
Flat	1
Flat	1
Flat	1

Flat	1
Up	0
Flat	1
Up	0
Flat	1
Flat	1
Flat	0
Up	1
Flat	0
Up	0
Up	0
Flat	1
Flat	1
Flat	1
Flat	1
Flat	0
Up	0
Up	0
Flat	1
Up	0
Flat	0
Flat	1
Down	1
Flat	0
Up	0
Flat	1
Flat	0
Flat	0
Up	0
Up	0
Up	0
Flat	0
Up	0
Flat	1
Up	0
Flat	1
Up	0
Up	0
Down	1
Flat	1
Up	1
Up	1
Up	1
Up	0
Up	0
Up	1
Up	0

Up	0
Up	0
Flat	1
Up	0
Up	1
Up	1
Flat	1
Flat	1
Flat	1
Up	0
Up	0
Up	0
Flat	0
Up	0
Flat	1
Up	0
Flat	1
Flat	1
Up	0
Flat	1
Up	0
Up	0
Down	0
Flat	1
Up	0
Up	1
Flat	0
Up	1
Flat	1
Up	0
Up	0
Flat	0
Up	0
Flat	1
Flat	0
Up	0
Flat	0
Up	0
Flat	1
Flat	1
Up	1
Flat	0
Flat	0
Up	0
Up	0
Down	0
Up	0

Flat	1
Up	0
Up	1
Flat	1
Flat	1
Up	1
Flat	1
Flat	0
Up	1
Up	0
Up	0
Flat	0
Flat	1
Up	0
Flat	1
Flat	1
Flat	1
Flat	0
Flat	1
Up	1
Flat	0
Flat	1
Up	0
Up	1
Up	0
Up	0
Flat	0
Up	1
Down	1
Down	0
Down	1
Flat	1
Flat	1
Flat	1
Up	0
Down	0
Up	0
Flat	1
Flat	0
Up	0
Up	1
Flat	1
Up	1
Up	0
Down	1
Up	0
Down	0

Up	0
Flat	1
Up	0
Up	0
Flat	1
Up	0
Flat	1
Up	0
Up	1
Flat	1
Up	1
Flat	1
Up	1
Up	0
Up	0
Flat	0
Up	0
Flat	0
Up	0
Up	0
Down	1
Up	0
Flat	0
Flat	1
Flat	1
Flat	1
Up	0
Flat	1
Up	0
Up	0
Up	0
Down	0
Flat	0
Flat	1
Flat	0
Flat	1
Flat	1
Flat	0
Up	0
Flat	1
Flat	1
Flat	1
Flat	1
Up	0
Down	0
Flat	1
Up	1

Flat	0
Up	0
Up	0
Flat	1
Up	0
Flat	0
Flat	1
Up	0
Down	1
Up	0
Up	1
Up	0
Flat	0
Flat	0
Flat	0
Up	0
Up	1
Up	0
Up	1
Flat	1
Up	1
Flat	1
Flat	0
Up	0
Flat	0
Flat	1
Down	0
Flat	1
Flat	0
Flat	0
Flat	1
Up	0
Up	0
Up	0
Up	0
Flat	0
Up	0
Flat	1
Flat	1
Up	0
Up	1
Up	0
Flat	0
Flat	1
Flat	1
Up	0
Flat	0
Flat	1
Up	0
Flat	0

Flat	1
Flat	1
Up	0
Up	1
Flat	0
Down	1
Up	0
Flat	1
Up	0
Up	0
Flat	1
Up	0
Flat	0
Down	1
Up	0
Up	1
Up	1
Up	0
Flat	1
Flat	1
Flat	1
Up	0
Up	1
Up	0
Up	0
Up	0
Flat	0
Flat	1
Up	1
Up	0
Up	0
Flat	1
Flat	1
Up	0
Down	1
Up	0
Up	0
Flat	0
Flat	0
Flat	1
Up	0
Up	0
Flat	1
Flat	1
Up	1
Flat	0
Flat	0

[illegible]