In [1]:
```
#pip install --upgrade seaborn
```

In [3]:
```
import warnings
warnings.filterwarnings("ignore", category=FutureWarning)
```

In [4]:
```
import seaborn as sns
```

In [5]:
```
sns.get_dataset_names()
```

Out[5]:
```
['anagrams',
 'anscombe',
 'attention',
 'brain_networks',
 'car_crashes',
 'diamonds',
 'dots',
 'dowjones',
 'exercise',
 'flights',
 'fmri',
 'geyser',
 'glue',
 'healthexp',
 'iris',
 'mpg',
 'penguins',
 'planets',
 'seaice',
 'taxis',
 'tips',
 'titanic']
```

In [6]:
```
tips=sns.load_dataset("tips")
tips.head()
```

Out[6]:

	total_bill	tip	sex	smoker	day	time	size
0	16.99	1.01	Female	No	Sun	Dinner	2
1	10.34	1.66	Male	No	Sun	Dinner	3
2	21.01	3.50	Male	No	Sun	Dinner	3
3	23.68	3.31	Male	No	Sun	Dinner	2
4	24.59	3.61	Female	No	Sun	Dinner	4

In [7]:
```
titanic = sns.load_dataset("titanic")
titanic.head
```

Out[7]:
```
<bound method NDFrame.head of      survived  pclass     sex   age  sibsp  parch
fare embarked   class  \
0           0       3    male  22.0      1      0   7.2500        S   Third
1           1       1  female  38.0      1      0  71.2833        C   First
2           1       3  female  26.0      0      0   7.9250        S   Third
3           1       1  female  35.0      1      0  53.1000        S   First
4           0       3    male  35.0      0      0   8.0500        S   Third
..        ...     ...     ...   ...    ...    ...      ...      ...     ...
886         0       2    male  27.0      0      0  13.0000        S  Second
887         1       1  female  19.0      0      0  30.0000        S   First
888         0       3  female   NaN      1      2  23.4500        S   Third
889         1       1    male  26.0      0      0  30.0000        C   First
890         0       3    male  32.0      0      0   7.7500        Q   Third

       who  adult_male deck  embark_town alive  alone
0      man        True  NaN  Southampton    no  False
1    woman       False    C    Cherbourg   yes  False
2    woman       False  NaN  Southampton   yes   True
3    woman       False    C  Southampton   yes  False
4      man        True  NaN  Southampton    no   True
..     ...         ...  ...          ...   ...    ...
886    man        True  NaN  Southampton    no   True
887  woman       False    B  Southampton   yes   True
888  woman       False  NaN  Southampton    no  False
889    man        True    C    Cherbourg   yes   True
890    man        True  NaN   Queenstown    no   True

[891 rows x 15 columns]>
```

In [8]:
```
taxis=sns.load_dataset("taxis")
taxis.head()
```

Out[8]:

	pickup	dropoff	passengers	distance	fare	tip	tolls	total	color	payment	picku
0	2019-03-23 20:21:09	2019-03-23 20:27:24	1	1.60	7.0	2.15	0.0	12.95	yellow	credit card	Le
1	2019-03-04 16:11:55	2019-03-04 16:19:00	1	0.79	5.0	0.00	0.0	9.30	yellow	cash	Upp Sid
2	2019-03-27 17:53:01	2019-03-27 18:00:25	1	1.37	7.5	2.36	0.0	14.16	yellow	credit card	A
3	2019-03-10 01:23:59	2019-03-10 01:49:51	1	7.70	27.0	6.15	0.0	36.95	yellow	credit card	Hud
4	2019-03-30 13:27:42	2019-03-30 13:37:14	3	2.16	9.0	1.10	0.0	13.40	yellow	credit card	M

In [9]:
```
sns.set_theme(style="darkgrid")
```

In [11]:
```
tips.to_csv("tips_dataset.csv", index=False)
import pandas as pd
```

In [12]:
```
import os
os.getcwd()
```

Out[12]:
```
'C:\\Users\\G BHARANIKA'
```

In [13]:
```
import matplotlib.pyplot as plt
```

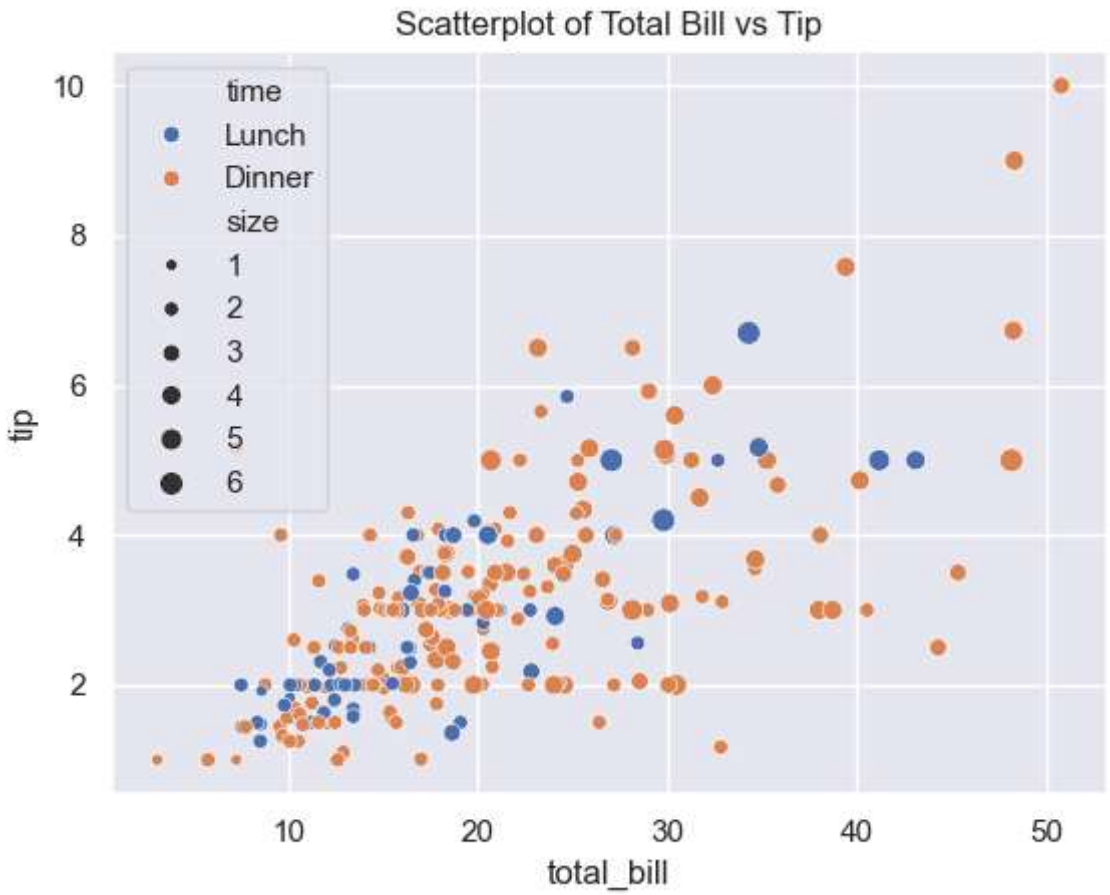
In [14]:
```
plt.figure(figsize=(8,6))
```

Out[14]:
```
<Figure size 800x600 with 0 Axes>
```

```
<Figure size 800x600 with 0 Axes>
```

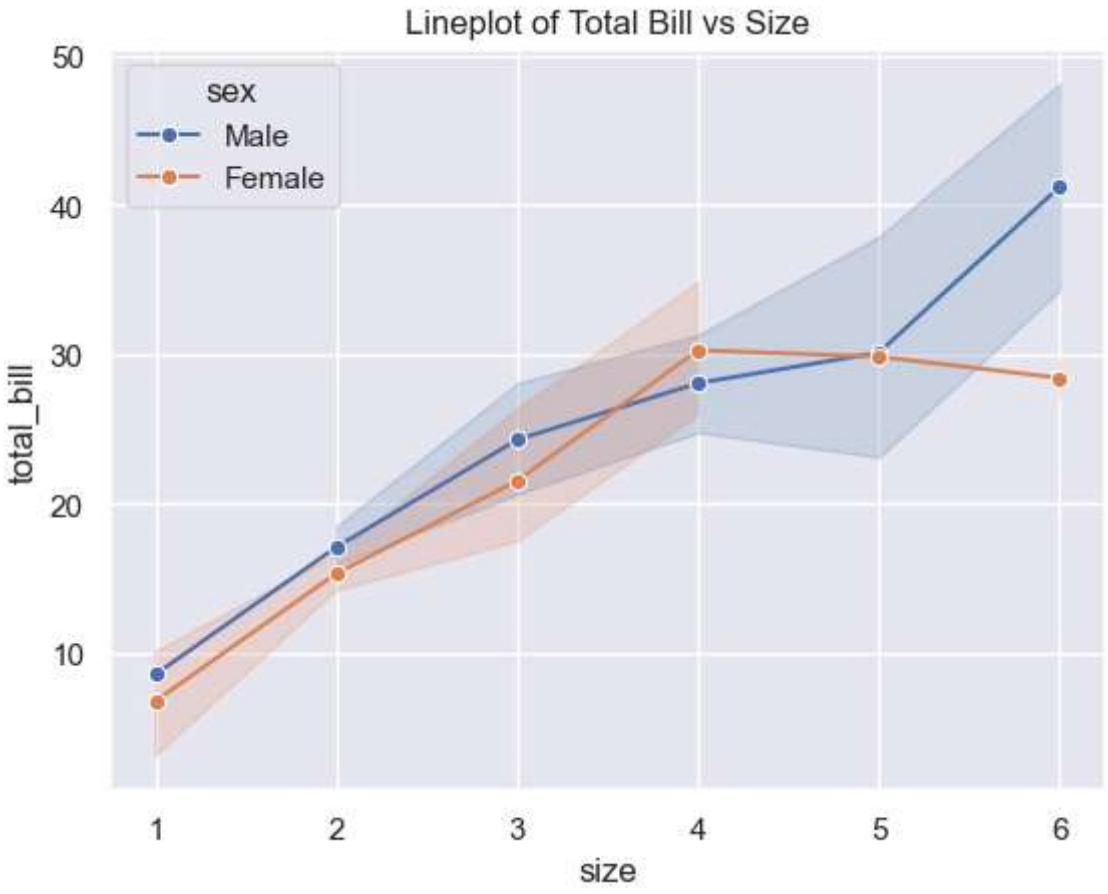
In [15]:
```
sns.scatterplot(data=tips,x="total_bill", y="tip",hue="time", size="size", palette=
plt.title("Scatterplot of Total Bill vs Tip")
plt.show
```

Out[15]:
```
<function matplotlib.pyplot.show(close=None, block=None)>
```

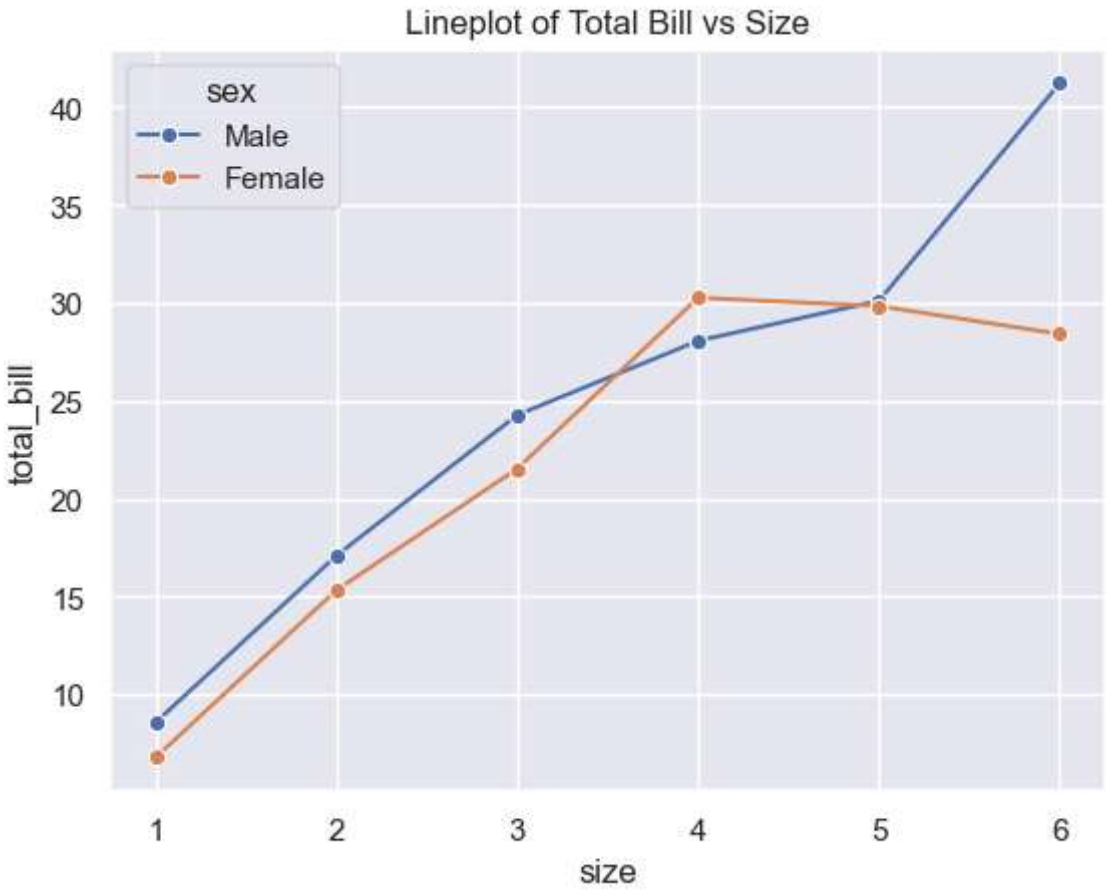


In [16]:
```
# line plot
sns.lineplot(data=tips, x='size', y='total_bill',hue='sex', marker='o')
```

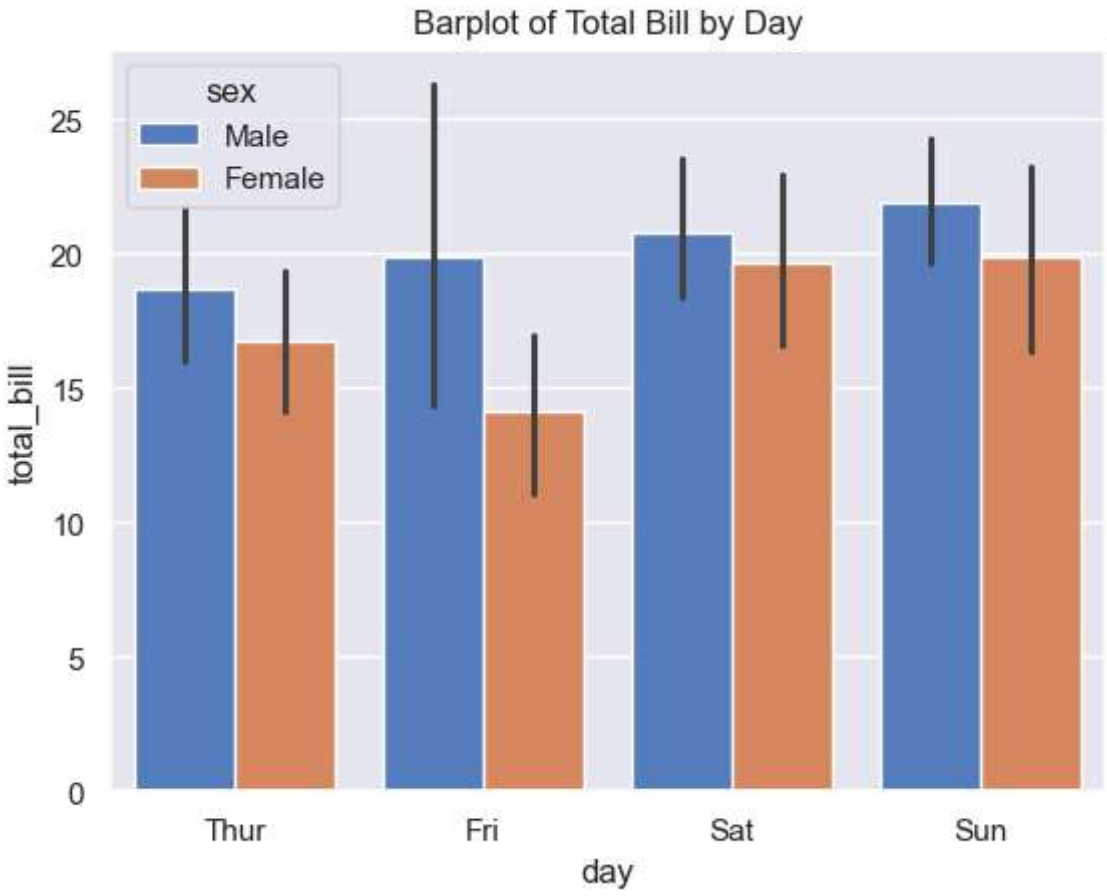
```
plt.title("Lineplot of Total Bill vs Size")
plt.show()
```



In [17]:
```
sns.lineplot(data=tips, x='size', y='total_bill',hue='sex',ci=None, marker='o')
plt.title("Lineplot of Total Bill vs Size")
plt.show()
```



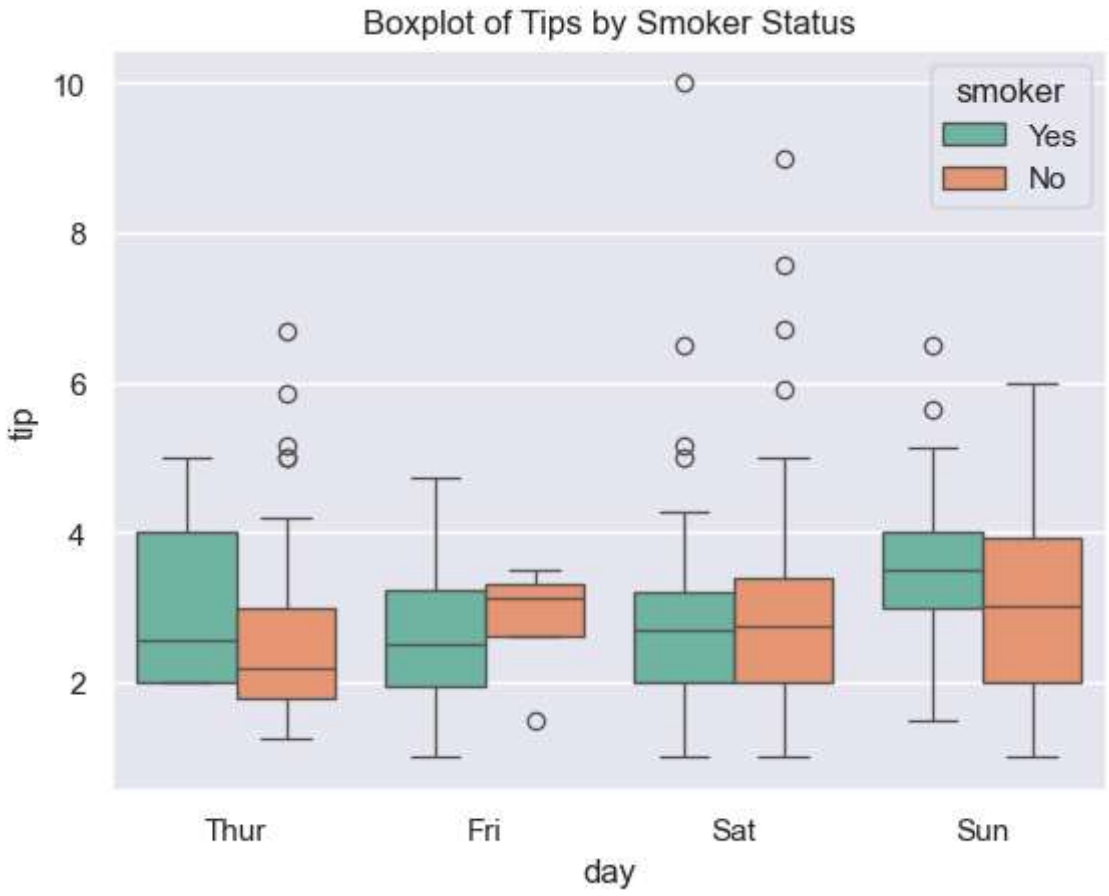
In [19]:
```
#3 bar plot
sns.barplot(data=tips, x='day',y='total_bill', hue='sex', palette='muted')
plt.title("Barplot of Total Bill by Day")
plt.show()
```



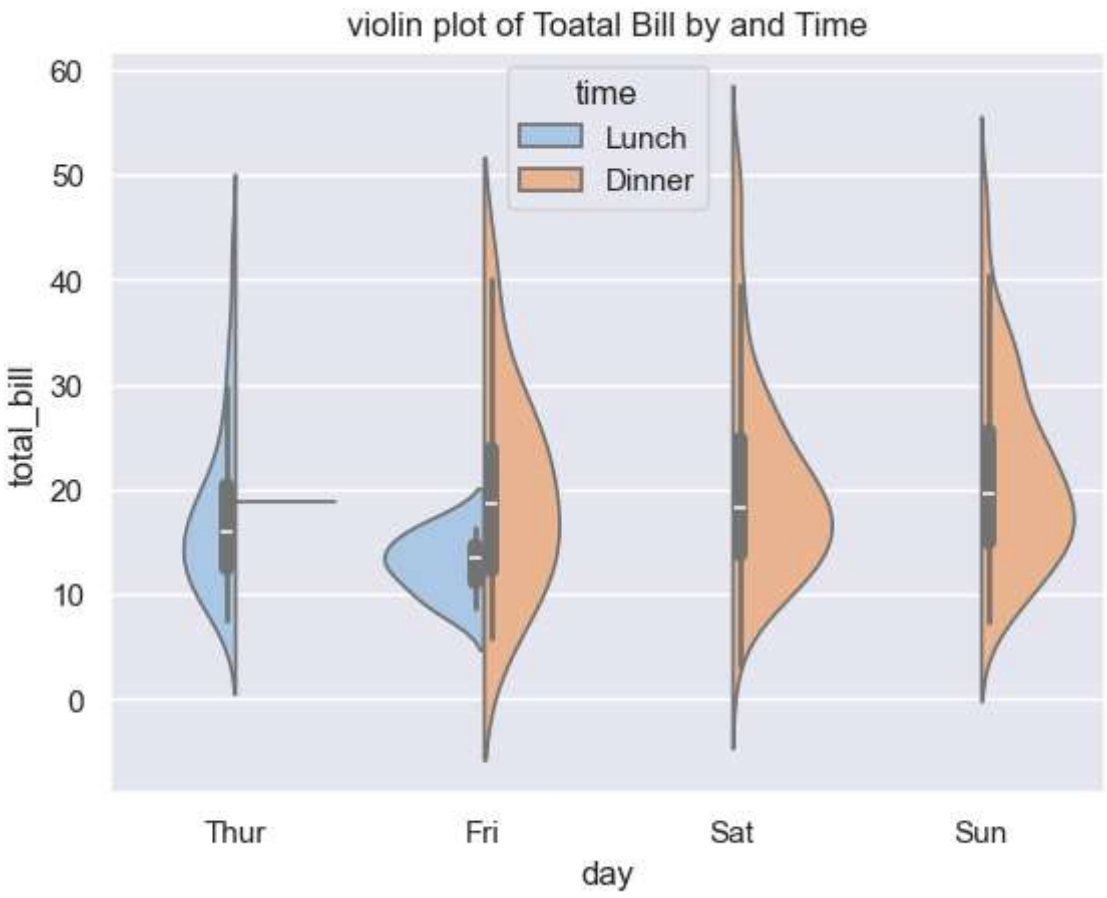
In [20]:
```
tips.columns
```

Out[20]:
```
Index(['total_bill', 'tip', 'sex', 'smoker', 'day', 'time', 'size'], dtype='objec
t')
```

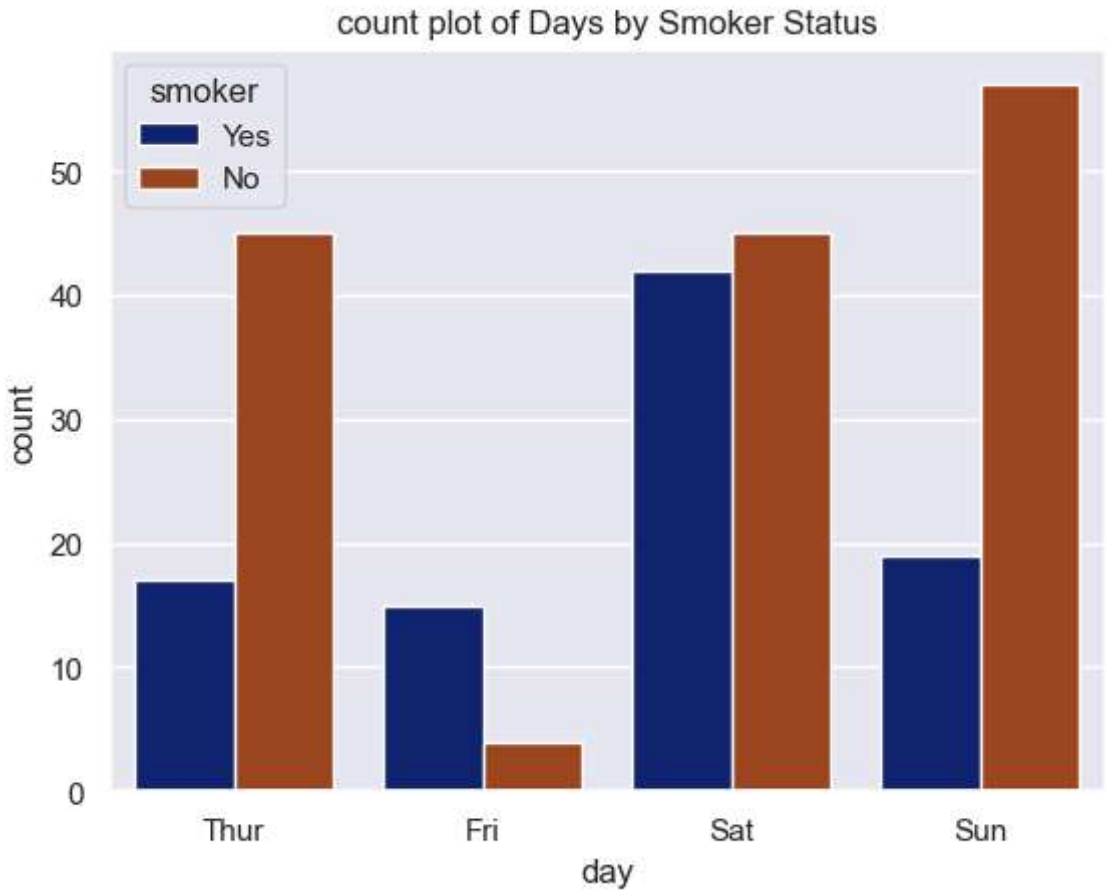
In [23]:
```
#4 boxplot
sns.boxplot(data=tips, x='day', y='tip', hue='smoker',palette='Set2')
plt.title("Boxplot of Tips by Smoker Status")
plt.show()
```



In [25]:
```
# 5 violin plot
sns.violinplot(data=tips, x='day', y='total_bill', hue='time', split=True, palette=
plt.title("violin plot of Toatal Bill by and Time")
plt.show()
```



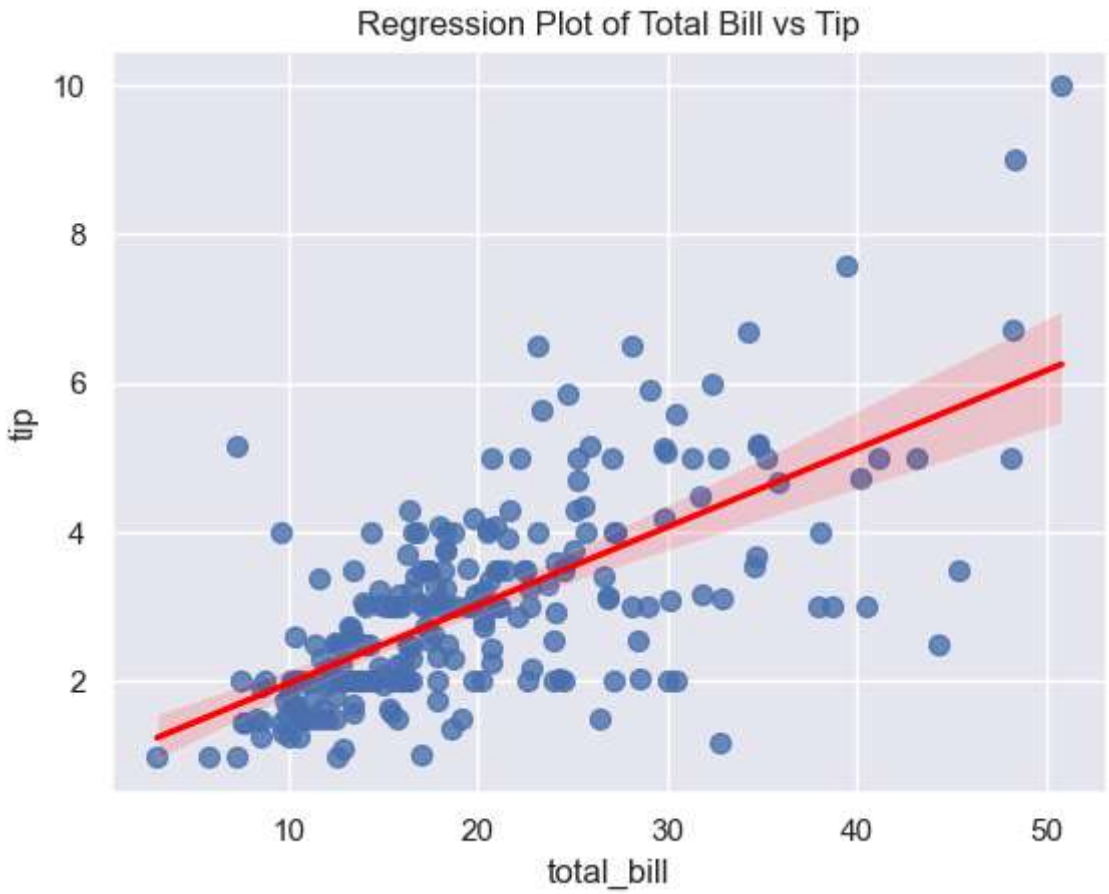
In [26]:
```
#6 count plot
sns.countplot(data=tips, x='day', hue='smoker', palette='dark')
plt.title("count plot of Days by Smoker Status")
plt.show()
```



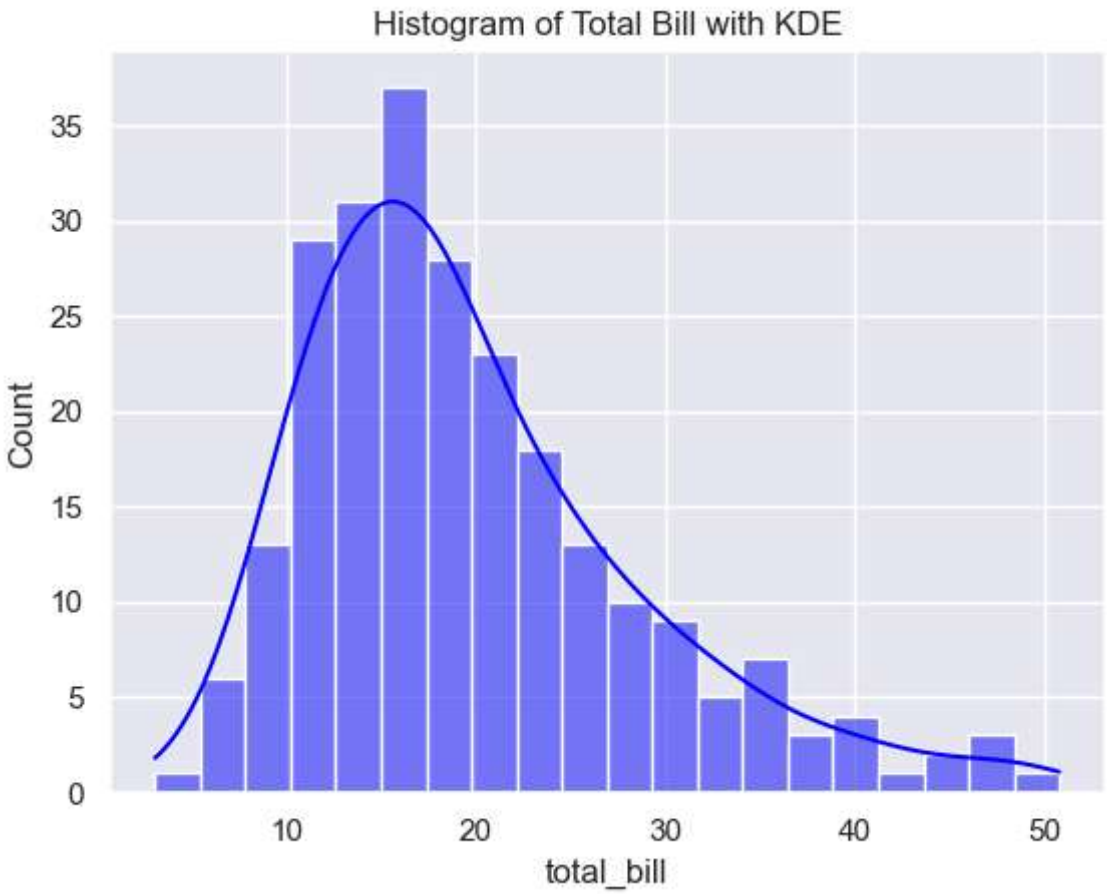
In [27]:
```
tips.columns
```

Out[27]:
```
Index(['total_bill', 'tip', 'sex', 'smoker', 'day', 'time', 'size'], dtype='objec
t')
```

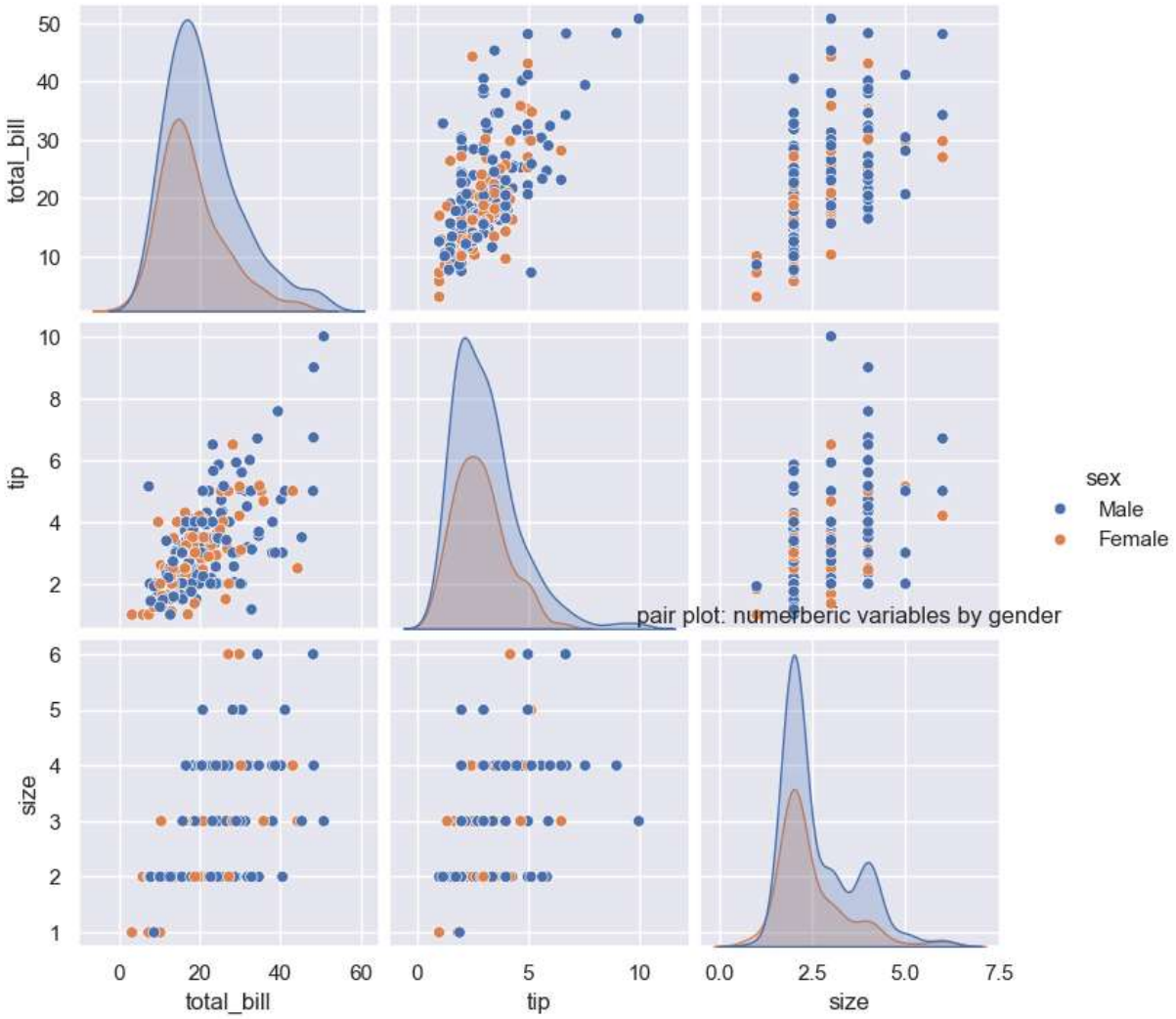
In [28]:
```
#7 Regression plot
sns.regplot(data=tips, x='total_bill', y='tip', scatter_kws={'s':50}, line_kws={'co
plt.title("Regression Plot of Total Bill vs Tip")
plt.show()
```



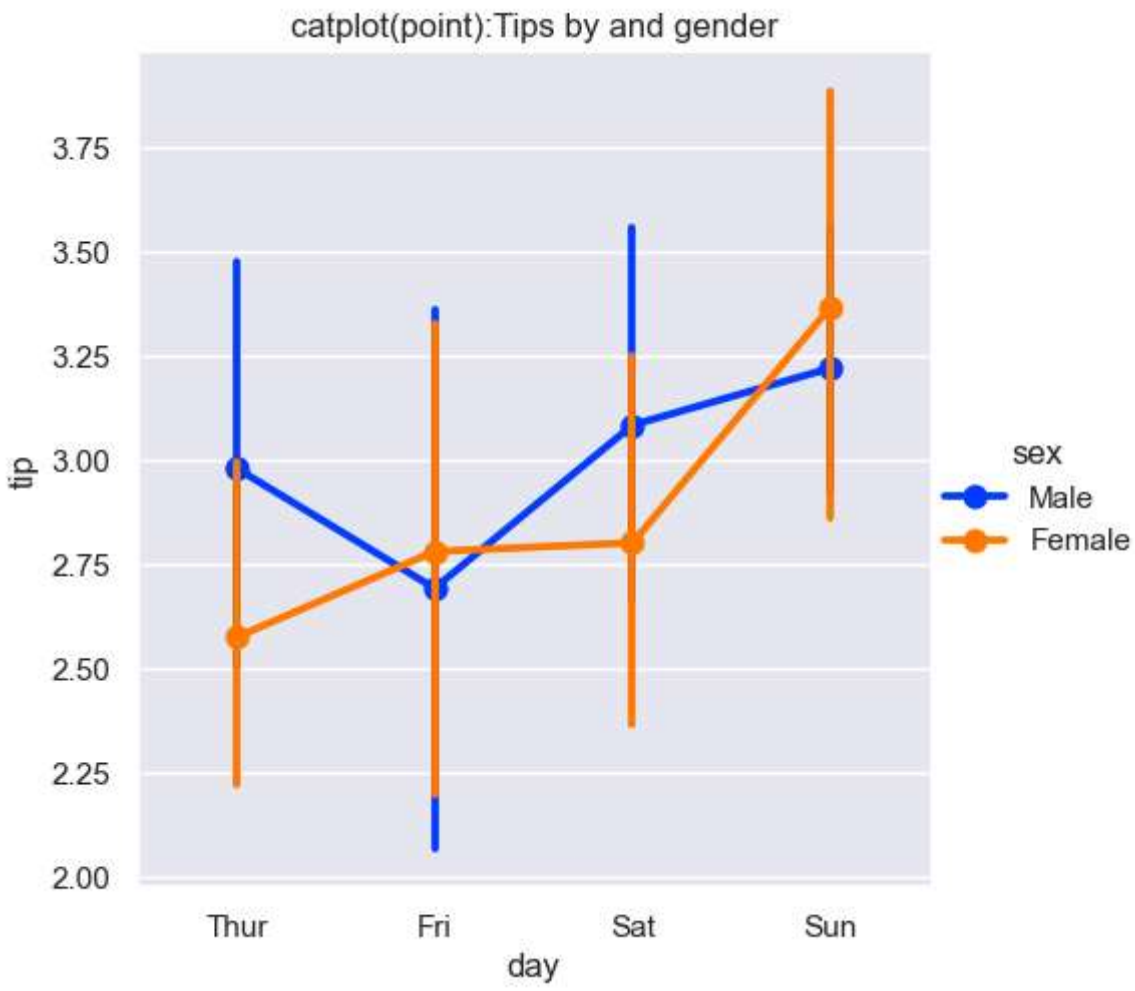
In [30]:
```
#8 Histogram
sns.histplot(data=tips, x='total_bill', bins=20, kde=True, color='blue')
plt.title("Histogram of Total Bill with KDE")
plt.show()
```



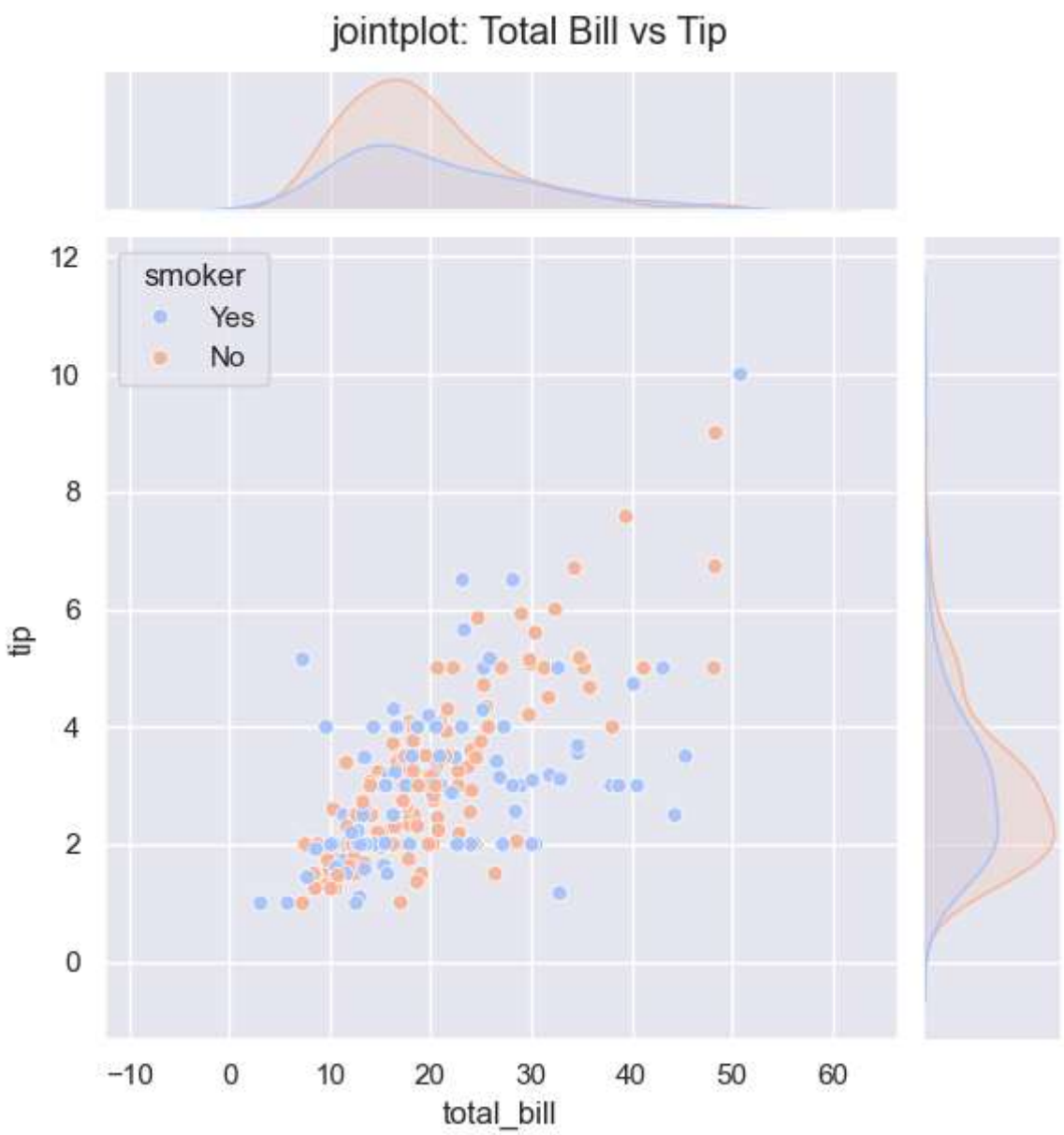
In [43]:
```
#9 pairplot
sns.pairplot(tips, hue='sex', vars=["total_bill", "tip", "size"])
plt.title("pair plot: numerberic variables by gender", y=1.02)
plt.show()
```



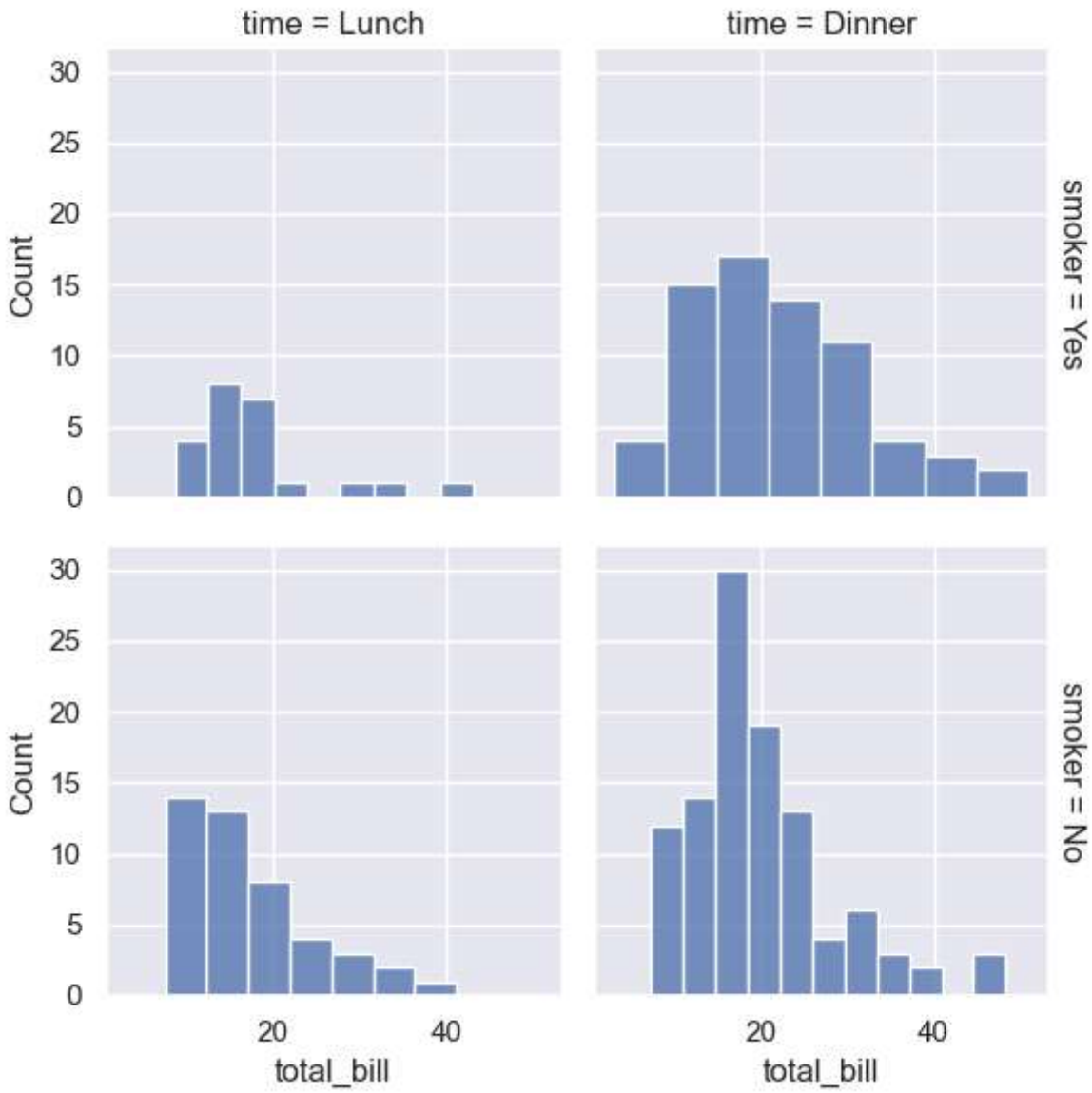
In [44]:
```
#10 catplot
sns.catplot(data=tips, x='day', y='tip', hue='sex',kind='point', palette='bright')
plt.title("catplot(point):Tips by and gender")
plt.show()
```



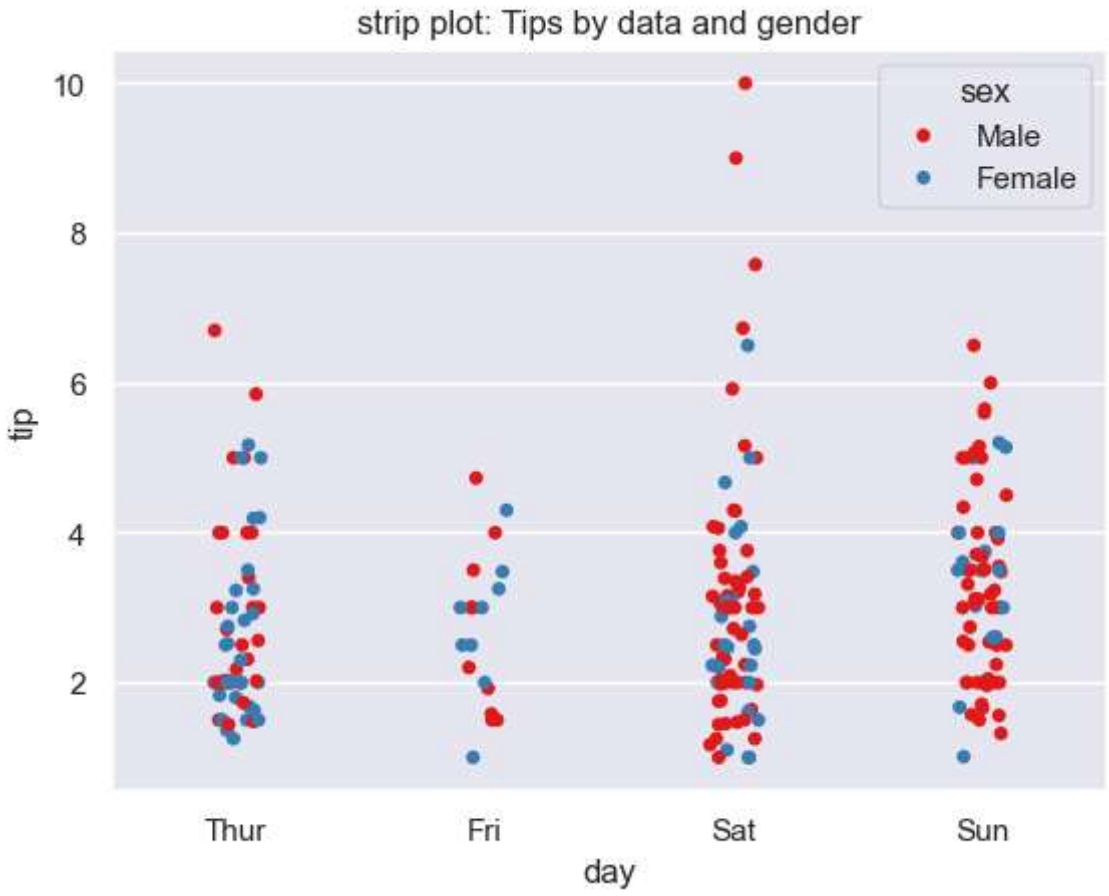
In [51]:
```
#11 Jointplot
sns.jointplot(data=tips, x='total_bill', y='tip', kind='scatter', hue='smoker', col
plt.suptitle("jointplot: Total Bill vs Tip", y=1.02)
plt.show()
```



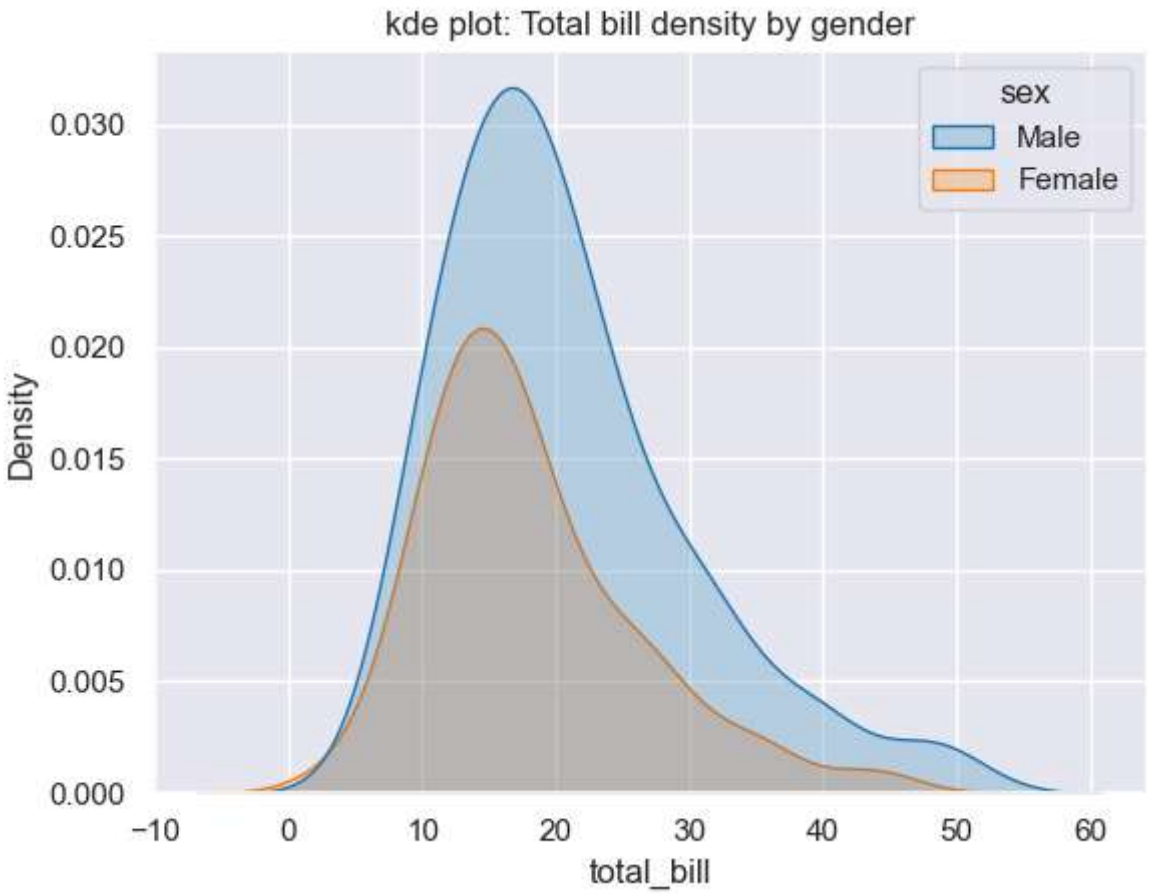
In [53]:
```
# 12 Facetgrid
g=sns.FacetGrid(tips, col='time', row='smoker', margin_titles=True).map(sns.histplo
```



In [55]:
```
# 13 Strip plot
sns.stripplot(data=tips, x='day', y='tip',hue='sex', jitter=True, palette='Set1')
plt.title("strip plot: Tips by data and gender")
plt.show()
```



In [58]:
```
# 14 KDE plot
sns.kdeplot(data=tips, x='total_bill', hue='sex', fill=True, palette='tab10')
plt.title("kde plot: Total bill density by gender")
plt.show()
```



SEA BORN CODE DEVELOPEMENT HAS DONE

In [ ]: