

Table of Contents

Introduction.....	1
Background and Scope.....	1
Import the Data.....	1
Two States Most Impacted by Harvey.....	5
Table of Events for Two Most Impacted States.....	5
Visualizations.....	6
Figure of Event Types.....	6
Figure of Event Locations.....	13
Analysis.....	14
Three Counties with Most Events in State 1.....	14
Three Counties with Most Events in State 2.....	20
Three Counties with Highest Property Cost in State 1.....	22
Three Counties with Highest Property Cost in State 2.....	28
Conclusions and Recommendations.....	30

Assignment

Introduction

How to use the template

There are many organize and communicate your results. To help ensure your peer-reviewers can accurately grade your report, this report includes the titles for the 4 required sections in Heading 1 style. Each required element for a given section has a Heading 2 area for you to place the final result.

Make sure to place your required findings in the appropriate area for your peer-reviewer to easily find them.

Also, only the heading titles are present. *The script is not broken into sections.*

Background and Scope

Import the Data

You may use an import function. If not using an import function, include the code used to import the data (it may be generated from the Import Tool)

```
uiimport("StormEvents_2017_finalProject.csv")
```

```
StormEvents2017finalProject
```

```
StormEvents2017finalProject = 57005x24 table
```

	EpisodeID	Event_ID	State	Year	Month	Event_Type
1	113355	678791	NEW JERSEY	2017	April	Thunderstorm Wind
2	113459	679228	FLORIDA	2017	April	Tornado
3	113448	679268	OHIO	2017	April	Thunderstorm Wind

	EpisodeID	Event_ID	State	Year	Month	Event_Type
4	113697	682042	OHIO	2017	April	Flood
5	113683	682062	NEBRASKA	2017	April	Hail
6	114718	688082	INDIANA	2017	April	Flash Flood
7	114834	688895	VIRGINIA	2017	April	Thunderstorm Wind
8	121068	724772	GULF OF ME...	2017	October	Marine Thunderstorm Wind
9	114489	686560	OHIO	2017	April	Flash Flood
10	113683	682156	NEBRASKA	2017	April	Thunderstorm Wind
11	115066	690966	ARKANSAS	2017	April	Hail
12	121162	725317	OKLAHOMA	2017	October	Hail
13	120474	721817	ATLANTIC N...	2017	October	Marine Strong Wind
14	120474	721818	ATLANTIC N...	2017	October	Marine High Wind
15	112855	675876	PENNSYLVANIA	2017	March	Winter Weather
16	112855	675879	PENNSYLVANIA	2017	March	Winter Weather
17	112855	675877	PENNSYLVANIA	2017	March	Winter Weather
18	113797	681330	WISCONSIN	2017	February	Winter Weather
19	113797	681332	WISCONSIN	2017	February	Winter Weather
20	115634	694778	GULF OF ME...	2017	June	Marine Thunderstorm Wind
21	115688	695188	FLORIDA	2017	June	Thunderstorm Wind
22	115811	696020	GULF OF ME...	2017	June	Marine Thunderstorm Wind
23	115811	696023	GULF OF ME...	2017	June	Marine Thunderstorm Wind
24	115752	695727	MONTANA	2017	June	Hail
25	115752	695729	MONTANA	2017	June	Hail
26	115752	695740	MONTANA	2017	June	Thunderstorm Wind
27	113797	681331	WISCONSIN	2017	February	Winter Weather
28	113797	681333	WISCONSIN	2017	February	Winter Weather
29	113797	681334	WISCONSIN	2017	February	Winter Weather
30	113797	681336	WISCONSIN	2017	February	Winter Weather
31	115176	691471	GULF OF ME...	2017	June	Waterspout
32	115176	691472	GULF OF ME...	2017	June	Waterspout
33	115634	694777	GULF OF ME...	2017	June	Marine Thunderstorm Wind
34	112855	675883	PENNSYLVANIA	2017	March	Winter Weather
35	113797	681282	WISCONSIN	2017	February	Winter Weather
36	115811	696124	GULF OF ME...	2017	June	Marine Thunderstorm Wind

	EpisodeID	Event_ID	State	Year	Month	Event_Type
37	115811	696134	GULF OF ME...	2017	June	Marine Thunderstorm Wind
38	115811	696176	GULF OF ME...	2017	June	Marine Thunderstorm Wind
39	115811	696179	GULF OF ME...	2017	June	Marine Thunderstorm Wind
40	115902	696463	FLORIDA	2017	June	Thunderstorm Wind
41	115904	696474	GULF OF ME...	2017	June	Marine Thunderstorm Wind
42	115940	696653	GULF OF ME...	2017	June	Marine Thunderstorm Wind
43	116635	701349	FLORIDA	2017	June	Flash Flood
44	116635	701350	FLORIDA	2017	June	Flash Flood
45	116635	701351	FLORIDA	2017	June	Flash Flood
46	116636	701352	FLORIDA	2017	June	Flash Flood
47	116636	701353	FLORIDA	2017	June	Flash Flood
48	116636	701354	FLORIDA	2017	June	Flood
49	116636	701355	FLORIDA	2017	June	Flood
50	115691	698754	MISSOURI	2017	June	Thunderstorm Wind
51	115691	698756	MISSOURI	2017	June	Thunderstorm Wind
52	116224	698777	KANSAS	2017	June	Hail
53	116224	698778	KANSAS	2017	June	Hail
54	116224	698779	KANSAS	2017	June	Thunderstorm Wind
55	116224	698780	KANSAS	2017	June	Thunderstorm Wind
56	116224	698781	KANSAS	2017	June	Thunderstorm Wind
57	116224	698782	KANSAS	2017	June	Hail
58	115691	698760	MISSOURI	2017	June	Thunderstorm Wind
59	115691	698761	MISSOURI	2017	June	Thunderstorm Wind
60	115691	698762	MISSOURI	2017	June	Thunderstorm Wind
61	115691	698763	MISSOURI	2017	June	Thunderstorm Wind
62	115691	698764	MISSOURI	2017	June	Thunderstorm Wind
63	115691	698765	MISSOURI	2017	June	Heavy Rain
64	115691	698766	MISSOURI	2017	June	Heavy Rain
65	116222	698768	MISSOURI	2017	June	Flash Flood
66	116222	698769	MISSOURI	2017	June	Flash Flood
67	116222	698770	MISSOURI	2017	June	Hail
68	116636	701356	FLORIDA	2017	June	Flood
69	116636	701357	FLORIDA	2017	June	Flood

	EpisodeID	Event_ID	State	Year	Month	Event_Type
70	115330	692444	ATLANTIC S...	2017	June	Marine Thunderstorm Wind
71	115330	692448	ATLANTIC S...	2017	June	Marine Thunderstorm Wind
72	115330	692453	ATLANTIC S...	2017	June	Marine Thunderstorm Wind
73	115691	698751	MISSOURI	2017	June	Lightning
74	115691	698752	MISSOURI	2017	June	Thunderstorm Wind
75	115691	698753	MISSOURI	2017	June	Thunderstorm Wind
76	115691	698757	MISSOURI	2017	June	Thunderstorm Wind
77	115691	698758	MISSOURI	2017	June	Thunderstorm Wind
78	115691	698759	MISSOURI	2017	June	Thunderstorm Wind
79	116222	698771	MISSOURI	2017	June	Thunderstorm Wind
80	116222	698772	MISSOURI	2017	June	Thunderstorm Wind
81	116222	698773	MISSOURI	2017	June	Thunderstorm Wind
82	116222	698774	MISSOURI	2017	June	Thunderstorm Wind
83	116224	698775	KANSAS	2017	June	Hail
84	116224	698776	KANSAS	2017	June	Hail
85	116224	698783	KANSAS	2017	June	Thunderstorm Wind
86	116224	698784	KANSAS	2017	June	Thunderstorm Wind
87	116224	698785	KANSAS	2017	June	Thunderstorm Wind
88	115940	696657	GULF OF ME...	2017	June	Waterspout
89	115968	696991	FLORIDA	2017	June	Thunderstorm Wind
90	115966	697003	GULF OF ME...	2017	June	Marine Thunderstorm Wind
91	115966	697015	GULF OF ME...	2017	June	Marine Thunderstorm Wind
92	115992	697128	GULF OF ME...	2017	June	Waterspout
93	116634	701344	ALABAMA	2017	June	Thunderstorm Wind
94	116632	701345	ALABAMA	2017	June	Thunderstorm Wind
95	116224	698786	KANSAS	2017	June	Thunderstorm Wind
96	116224	698787	KANSAS	2017	June	Thunderstorm Wind
97	116224	698788	KANSAS	2017	June	Thunderstorm Wind
98	116224	698789	KANSAS	2017	June	Thunderstorm Wind
99	116224	698790	KANSAS	2017	June	Thunderstorm Wind
100	116225	698801	MISSOURI	2017	June	Thunderstorm Wind

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Two States Most Impacted by Harvey

Clearly state the two states in order

Texas

Puerto Rico

```
Data1 = StormEvents2017finalProject;
Data1.Property_Cost(ismissing(Data1.Property_Cost))=0;
Data1.Crop_Cost(ismissing(Data1.Crop_Cost)) = 0;
Data1.Total_Cost = Data1.Property_Cost+Data1.Crop_Cost;
scatter(Data1,"State","Total_Cost")
```

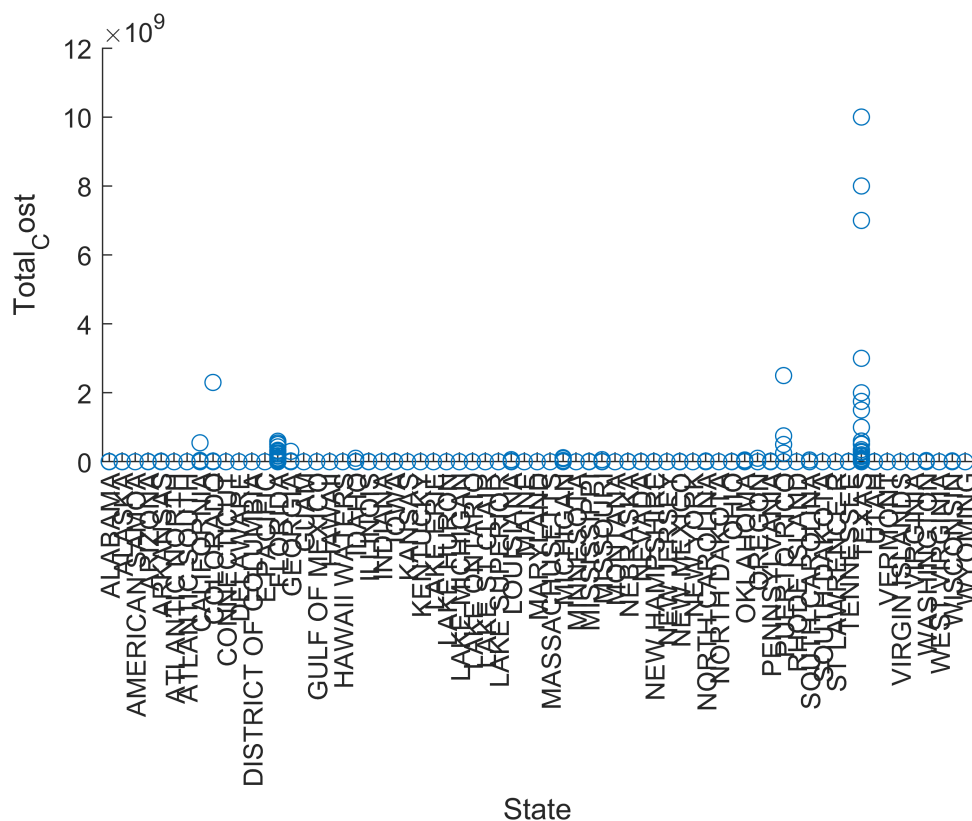


Table of Events for Two Most Impacted States

Create and display a few rows of events that include only the two most affected states

```
Data2 = Data1(Data1.State == "TEXAS" | Data1.State == "PUERTO RICO",:);
[PR_Loss, id1]= maxk(Data2.Total_Cost(Data2.State == "PUERTO RICO"),5);
PR_Event_Type = Data2.Event_Type(id1);
[TX_Loss, id2]= maxk(Data2.Total_Cost(Data2.State == "TEXAS"),5);
TX_Event_Type = Data2.Event_Type(id2);
table(PR_Loss,PR_Event_Type,TX_Loss,TX_Event_Type)
```

ans = 5x4 table

	PR_Loss	PR_Event_Type	TX_Loss	TX_Event_Type
1	2.5000e+09	Thunderstorm Wind	1.0000e+10	Thunderstorm Wind
2	750000000	Thunderstorm Wind	1.0000e+10	Lightning
3	750000000	Hail	1.0000e+10	Hail
4	750000000	Thunderstorm Wind	8.0000e+09	Thunderstorm Wind
5	750000000	Thunderstorm Wind	8.0000e+09	Thunderstorm Wind

Visualizations

Figure of Event Types

Create a figure showing the type and number of occurances for events related to Harvey in the two states

Data2

Data2 = 3850x25 table

...

	EpisodeID	Event_ID	State	Year	Month	Event_Type	CZ_Name
1	115737	695622	TEXAS	2017	May	Hail	HENDERSON
2	111748	666464	TEXAS	2017	January	Tornado	BOSQUE
3	112430	672657	TEXAS	2017	January	Thunderstorm Wind	DALLAS
4	112430	672660	TEXAS	2017	January	Thunderstorm Wind	LEON
5	112430	672661	TEXAS	2017	January	Thunderstorm Wind	ELLIS
6	112430	672744	TEXAS	2017	January	Thunderstorm Wind	LEON
7	112430	672745	TEXAS	2017	January	Thunderstorm Wind	RAINS
8	111748	673560	TEXAS	2017	January	Hail	JOHNSON
9	111748	673561	TEXAS	2017	January	Hail	TARRANT
10	111748	673566	TEXAS	2017	January	Thunderstorm Wind	TARRANT
11	111748	673567	TEXAS	2017	January	Flash Flood	JOHNSON
12	111748	673568	TEXAS	2017	January	Thunderstorm Wind	TARRANT
13	111748	673569	TEXAS	2017	January	Thunderstorm Wind	COLLIN
14	111748	673571	TEXAS	2017	January	Thunderstorm Wind	DALLAS
15	111748	673575	TEXAS	2017	January	Thunderstorm Wind	DALLAS
16	112430	670264	TEXAS	2017	January	Thunderstorm Wind	CORYELL
17	112430	672746	TEXAS	2017	January	Thunderstorm Wind	ANDERSON
18	111748	673576	TEXAS	2017	January	Thunderstorm Wind	COLLIN

	EpisodeID	Event_ID	State	Year	Month	Event_Type	CZ_Name
19	111748	673578	TEXAS	2017	January	Thunderstorm Wind	HUNT
20	111748	673579	TEXAS	2017	January	Flood	TARRANT
21	111748	675279	TEXAS	2017	January	Hail	TARRANT
22	111748	739562	TEXAS	2017	January	Tornado	BOSQUE
23	112430	672747	TEXAS	2017	January	Thunderstorm Wind	HUNT
24	112430	673519	TEXAS	2017	January	Lightning	COLLIN
25	111748	673531	TEXAS	2017	January	Thunderstorm Wind	JOHNSON
26	112430	672654	TEXAS	2017	January	Thunderstorm Wind	DALLAS
27	112430	672655	TEXAS	2017	January	Thunderstorm Wind	KAUFMAN
28	112430	670265	TEXAS	2017	January	Thunderstorm Wind	MCLENNAN
29	112430	670266	TEXAS	2017	January	Thunderstorm Wind	HAMILTON
30	112430	670267	TEXAS	2017	January	Thunderstorm Wind	MCLENNAN
31	112430	670268	TEXAS	2017	January	Thunderstorm Wind	MCLENNAN
32	112430	672371	TEXAS	2017	January	Thunderstorm Wind	JOHNSON
33	112430	672656	TEXAS	2017	January	Thunderstorm Wind	NAVARRO
34	112430	672372	TEXAS	2017	January	Thunderstorm Wind	HILL
35	112430	672373	TEXAS	2017	January	Thunderstorm Wind	DALLAS
36	112761	673538	TEXAS	2017	January	Drought	LAMAR
37	112761	673541	TEXAS	2017	January	Drought	FANNIN
38	112761	673543	TEXAS	2017	January	Drought	DELTA
39	111748	673556	TEXAS	2017	January	Thunderstorm Wind	JOHNSON
40	111748	673557	TEXAS	2017	January	Thunderstorm Wind	JOHNSON
41	111748	673558	TEXAS	2017	January	Thunderstorm Wind	JOHNSON
42	111748	673559	TEXAS	2017	January	Thunderstorm Wind	JOHNSON
43	112430	672653	TEXAS	2017	January	Thunderstorm Wind	NAVARRO
44	116163	698160	TEXAS	2017	May	Thunderstorm Wind	LA SALLE
45	116163	698165	TEXAS	2017	May	Hail	DUVAL
46	113061	676044	TEXAS	2017	March	Hail	LUBBOCK
47	116163	698174	TEXAS	2017	May	Hail	DUVAL
48	116163	698176	TEXAS	2017	May	Hail	DUVAL
49	113755	683996	TEXAS	2017	March	Hail	DENTON
50	120357	721909	PUERTO R...	2017	September	Hurricane	EASTERN I...
51	120357	721910	PUERTO R...	2017	September	Hurricane	EASTERN I...

	EpisodeID	Event_ID	State	Year	Month	Event_Type	CZ_Name
52	120357	721914	PUERTO R...	2017	September	Flash Flood	COAMO
53	120357	721915	PUERTO R...	2017	September	Flash Flood	COROZAL
54	120357	721916	PUERTO R...	2017	September	Hurricane	CENTRAL I...
55	120357	722607	PUERTO R...	2017	September	Flash Flood	AGUAS BUE...
56	120357	749456	PUERTO R...	2017	September	Flash Flood	TOA BAJA
57	120357	749457	PUERTO R...	2017	September	Flash Flood	VEGA ALTA
58	120357	721917	PUERTO R...	2017	September	Hurricane	CENTRAL I...
59	120357	721918	PUERTO R...	2017	September	Hurricane	CENTRAL I...
60	120357	721919	PUERTO R...	2017	September	Hurricane	CENTRAL I...
61	120357	721920	PUERTO R...	2017	September	Hurricane	CENTRAL I...
62	120357	721921	PUERTO R...	2017	September	Hurricane	CENTRAL I...
63	120357	721926	PUERTO R...	2017	September	Flash Flood	GUAYAMA
64	120357	721927	PUERTO R...	2017	September	Flash Flood	GUAYANILLA
65	120357	722611	PUERTO R...	2017	September	Flash Flood	CAROLINA
66	120357	722612	PUERTO R...	2017	September	Flash Flood	BAYAMON
67	120357	722613	PUERTO R...	2017	September	Flash Flood	CATANO
68	120357	722614	PUERTO R...	2017	September	Flash Flood	BARCELONETA
69	120357	722615	PUERTO R...	2017	September	Flash Flood	BARRANQUI...
70	120357	722617	PUERTO R...	2017	September	Flash Flood	ADJUNTAS
71	120357	721922	PUERTO R...	2017	September	Hurricane	CENTRAL I...
72	120357	721923	PUERTO R...	2017	September	Flash Flood	DORAD
73	120357	721924	PUERTO R...	2017	September	Flash Flood	FAJARDO
74	120357	721925	PUERTO R...	2017	September	Flash Flood	FLORIDA
75	120357	721928	PUERTO R...	2017	September	Flash Flood	GUAYNABO
76	120357	721929	PUERTO R...	2017	September	Flash Flood	GURABO
77	120357	721931	PUERTO R...	2017	September	Flash Flood	GUANICA
78	120357	721933	PUERTO R...	2017	September	Flash Flood	HATILLO
79	120357	721934	PUERTO R...	2017	September	Flash Flood	HORMIGUEROS
80	120357	721935	PUERTO R...	2017	September	Flash Flood	HUMACAO
81	120357	721936	PUERTO R...	2017	September	Flash Flood	ISABELA
82	120357	721937	PUERTO R...	2017	September	Flash Flood	JAYUYA
83	120357	722620	PUERTO R...	2017	September	Flash Flood	ARECIBO
84	120357	722622	PUERTO R...	2017	September	Flash Flood	AGUADA

	EpisodeID	Event_ID	State	Year	Month	Event_Type	CZ_Name
85	120357	722625	PUERTO R...	2017	September	Flash Flood	AGUADILLA
86	120357	722629	PUERTO R...	2017	September	Flash Flood	ANASCO
87	120357	722630	PUERTO R...	2017	September	Flash Flood	CABO ROJO
88	120357	749737	PUERTO R...	2017	September	Flash Flood	UTUADO
89	111748	666465	TEXAS	2017	January	Tornado	HILL
90	120357	722507	PUERTO R...	2017	September	Flash Flood	ARROYO
91	120357	722508	PUERTO R...	2017	September	Flash Flood	CANOVANAS
92	120357	722509	PUERTO R...	2017	September	Flash Flood	CEIBA
93	120357	722510	PUERTO R...	2017	September	Flash Flood	CAGUAS
94	120357	721364	PUERTO R...	2017	September	Flash Flood	COMERIO
95	120357	721503	PUERTO R...	2017	September	Flash Flood	PONCE
96	120357	721905	PUERTO R...	2017	September	Flash Flood	CIALES
97	120357	721906	PUERTO R...	2017	September	Flash Flood	CIDRA
98	120357	721907	PUERTO R...	2017	September	Hurricane	EASTERN I...
99	120357	721908	PUERTO R...	2017	September	Hurricane	EASTERN I...
100	120357	722633	PUERTO R...	2017	September	Flash Flood	CAMUY

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```
Data2.Event_Type = removecats(Data2.Event_Type,{ 'Avalanche', 'Dense Fog', 'Dense Smoke', 'Dust Dev
Data2.Event_Type = mergecats(Data2.Event_Type,{ 'Less Frequent Events', 'Debris Flow', 'Dust Storm
```

Data2 = 3850x25 table

...

	EpisodeID	Event_ID	State	Year	Month	Event_Type	CZ_Name
1	115737	695622	TEXAS	2017	May	Hail	HENDERSON
2	111748	666464	TEXAS	2017	January	Tornado	BOSQUE
3	112430	672657	TEXAS	2017	January	Thunderstorm Wind	DALLAS
4	112430	672660	TEXAS	2017	January	Thunderstorm Wind	LEON
5	112430	672661	TEXAS	2017	January	Thunderstorm Wind	ELLIS
6	112430	672744	TEXAS	2017	January	Thunderstorm Wind	LEON
7	112430	672745	TEXAS	2017	January	Thunderstorm Wind	RAINS
8	111748	673560	TEXAS	2017	January	Hail	JOHNSON
9	111748	673561	TEXAS	2017	January	Hail	TARRANT
10	111748	673566	TEXAS	2017	January	Thunderstorm Wind	TARRANT
11	111748	673567	TEXAS	2017	January	Flash Flood	JOHNSON

	EpisodeID	Event_ID	State	Year	Month	Event_Type	CZ_Name
12	111748	673568	TEXAS	2017	January	Thunderstorm Wind	TARRANT
13	111748	673569	TEXAS	2017	January	Thunderstorm Wind	COLLIN
14	111748	673571	TEXAS	2017	January	Thunderstorm Wind	DALLAS
15	111748	673575	TEXAS	2017	January	Thunderstorm Wind	DALLAS
16	112430	670264	TEXAS	2017	January	Thunderstorm Wind	CORYELL
17	112430	672746	TEXAS	2017	January	Thunderstorm Wind	ANDERSON
18	111748	673576	TEXAS	2017	January	Thunderstorm Wind	COLLIN
19	111748	673578	TEXAS	2017	January	Thunderstorm Wind	HUNT
20	111748	673579	TEXAS	2017	January	Flood	TARRANT
21	111748	675279	TEXAS	2017	January	Hail	TARRANT
22	111748	739562	TEXAS	2017	January	Tornado	BOSQUE
23	112430	672747	TEXAS	2017	January	Thunderstorm Wind	HUNT
24	112430	673519	TEXAS	2017	January	Lightning	COLLIN
25	111748	673531	TEXAS	2017	January	Thunderstorm Wind	JOHNSON
26	112430	672654	TEXAS	2017	January	Thunderstorm Wind	DALLAS
27	112430	672655	TEXAS	2017	January	Thunderstorm Wind	KAUFMAN
28	112430	670265	TEXAS	2017	January	Thunderstorm Wind	MCLENNAN
29	112430	670266	TEXAS	2017	January	Thunderstorm Wind	HAMILTON
30	112430	670267	TEXAS	2017	January	Thunderstorm Wind	MCLENNAN
31	112430	670268	TEXAS	2017	January	Thunderstorm Wind	MCLENNAN
32	112430	672371	TEXAS	2017	January	Thunderstorm Wind	JOHNSON
33	112430	672656	TEXAS	2017	January	Thunderstorm Wind	NAVARRO
34	112430	672372	TEXAS	2017	January	Thunderstorm Wind	HILL
35	112430	672373	TEXAS	2017	January	Thunderstorm Wind	DALLAS
36	112761	673538	TEXAS	2017	January	Drought	LAMAR
37	112761	673541	TEXAS	2017	January	Drought	FANNIN
38	112761	673543	TEXAS	2017	January	Drought	DELTA
39	111748	673556	TEXAS	2017	January	Thunderstorm Wind	JOHNSON
40	111748	673557	TEXAS	2017	January	Thunderstorm Wind	JOHNSON
41	111748	673558	TEXAS	2017	January	Thunderstorm Wind	JOHNSON
42	111748	673559	TEXAS	2017	January	Thunderstorm Wind	JOHNSON
43	112430	672653	TEXAS	2017	January	Thunderstorm Wind	NAVARRO
44	116163	698160	TEXAS	2017	May	Thunderstorm Wind	LA SALLE

	EpisodeID	Event_ID	State	Year	Month	Event_Type	CZ_Name
45	116163	698165	TEXAS	2017	May	Hail	DUVAL
46	113061	676044	TEXAS	2017	March	Hail	LUBBOCK
47	116163	698174	TEXAS	2017	May	Hail	DUVAL
48	116163	698176	TEXAS	2017	May	Hail	DUVAL
49	113755	683996	TEXAS	2017	March	Hail	DENTON
50	120357	721909	PUERTO R...	2017	September	Hurricane	EASTERN I...
51	120357	721910	PUERTO R...	2017	September	Hurricane	EASTERN I...
52	120357	721914	PUERTO R...	2017	September	Flash Flood	COAMO
53	120357	721915	PUERTO R...	2017	September	Flash Flood	COROZAL
54	120357	721916	PUERTO R...	2017	September	Hurricane	CENTRAL I...
55	120357	722607	PUERTO R...	2017	September	Flash Flood	AGUAS BUE...
56	120357	749456	PUERTO R...	2017	September	Flash Flood	TOA BAJA
57	120357	749457	PUERTO R...	2017	September	Flash Flood	VEGA ALTA
58	120357	721917	PUERTO R...	2017	September	Hurricane	CENTRAL I...
59	120357	721918	PUERTO R...	2017	September	Hurricane	CENTRAL I...
60	120357	721919	PUERTO R...	2017	September	Hurricane	CENTRAL I...
61	120357	721920	PUERTO R...	2017	September	Hurricane	CENTRAL I...
62	120357	721921	PUERTO R...	2017	September	Hurricane	CENTRAL I...
63	120357	721926	PUERTO R...	2017	September	Flash Flood	GUAYAMA
64	120357	721927	PUERTO R...	2017	September	Flash Flood	GUAYANILLA
65	120357	722611	PUERTO R...	2017	September	Flash Flood	CAROLINA
66	120357	722612	PUERTO R...	2017	September	Flash Flood	BAYAMON
67	120357	722613	PUERTO R...	2017	September	Flash Flood	CATANO
68	120357	722614	PUERTO R...	2017	September	Flash Flood	BARCELONETA
69	120357	722615	PUERTO R...	2017	September	Flash Flood	BARRANQUI...
70	120357	722617	PUERTO R...	2017	September	Flash Flood	ADJUNTAS
71	120357	721922	PUERTO R...	2017	September	Hurricane	CENTRAL I...
72	120357	721923	PUERTO R...	2017	September	Flash Flood	DORAD
73	120357	721924	PUERTO R...	2017	September	Flash Flood	FAJARDO
74	120357	721925	PUERTO R...	2017	September	Flash Flood	FLORIDA
75	120357	721928	PUERTO R...	2017	September	Flash Flood	GUAYNABO
76	120357	721929	PUERTO R...	2017	September	Flash Flood	GURABO
77	120357	721931	PUERTO R...	2017	September	Flash Flood	GUANICA

	EpisodeID	Event_ID	State	Year	Month	Event_Type	CZ_Name
78	120357	721933	PUERTO R...	2017	September	Flash Flood	HATILLO
79	120357	721934	PUERTO R...	2017	September	Flash Flood	HORMIGUEROS
80	120357	721935	PUERTO R...	2017	September	Flash Flood	HUMACAO
81	120357	721936	PUERTO R...	2017	September	Flash Flood	ISABELA
82	120357	721937	PUERTO R...	2017	September	Flash Flood	JAYUYA
83	120357	722620	PUERTO R...	2017	September	Flash Flood	ARECIBO
84	120357	722622	PUERTO R...	2017	September	Flash Flood	AGUADA
85	120357	722625	PUERTO R...	2017	September	Flash Flood	AGUADILLA
86	120357	722629	PUERTO R...	2017	September	Flash Flood	ANASCO
87	120357	722630	PUERTO R...	2017	September	Flash Flood	CABO ROJO
88	120357	749737	PUERTO R...	2017	September	Flash Flood	UTUADO
89	111748	666465	TEXAS	2017	January	Tornado	HILL
90	120357	722507	PUERTO R...	2017	September	Flash Flood	ARROYO
91	120357	722508	PUERTO R...	2017	September	Flash Flood	CANOVANAS
92	120357	722509	PUERTO R...	2017	September	Flash Flood	CEIBA
93	120357	722510	PUERTO R...	2017	September	Flash Flood	CAGUAS
94	120357	721364	PUERTO R...	2017	September	Flash Flood	COMERIO
95	120357	721503	PUERTO R...	2017	September	Flash Flood	PONCE
96	120357	721905	PUERTO R...	2017	September	Flash Flood	CIALES
97	120357	721906	PUERTO R...	2017	September	Flash Flood	CIDRA
98	120357	721907	PUERTO R...	2017	September	Hurricane	EASTERN I...
99	120357	721908	PUERTO R...	2017	September	Hurricane	EASTERN I...
100	120357	722633	PUERTO R...	2017	September	Flash Flood	CAMUY

⋮

```
scatter(Data2.Event_Type, log(Data2.Total_Cost))
```

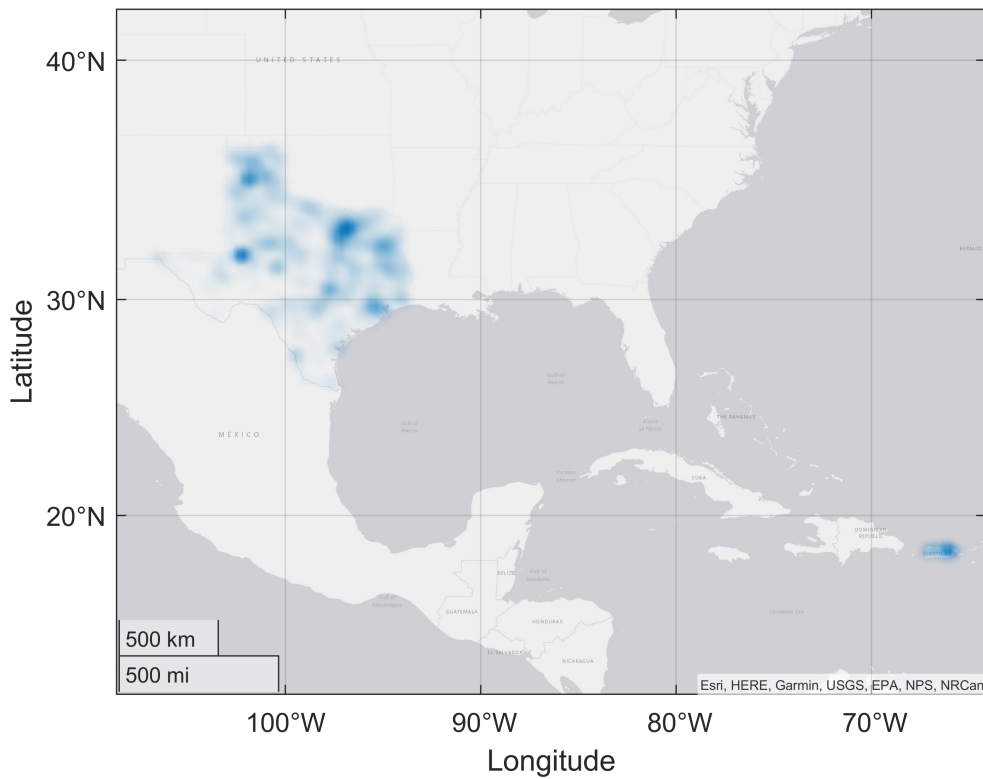
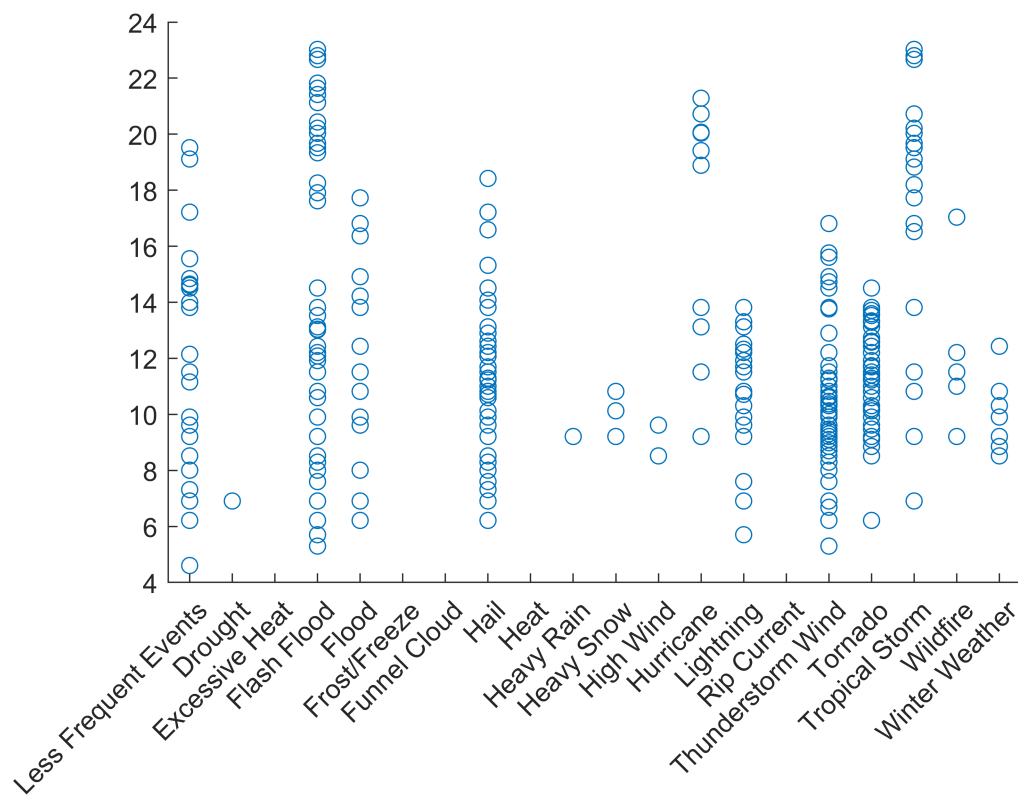
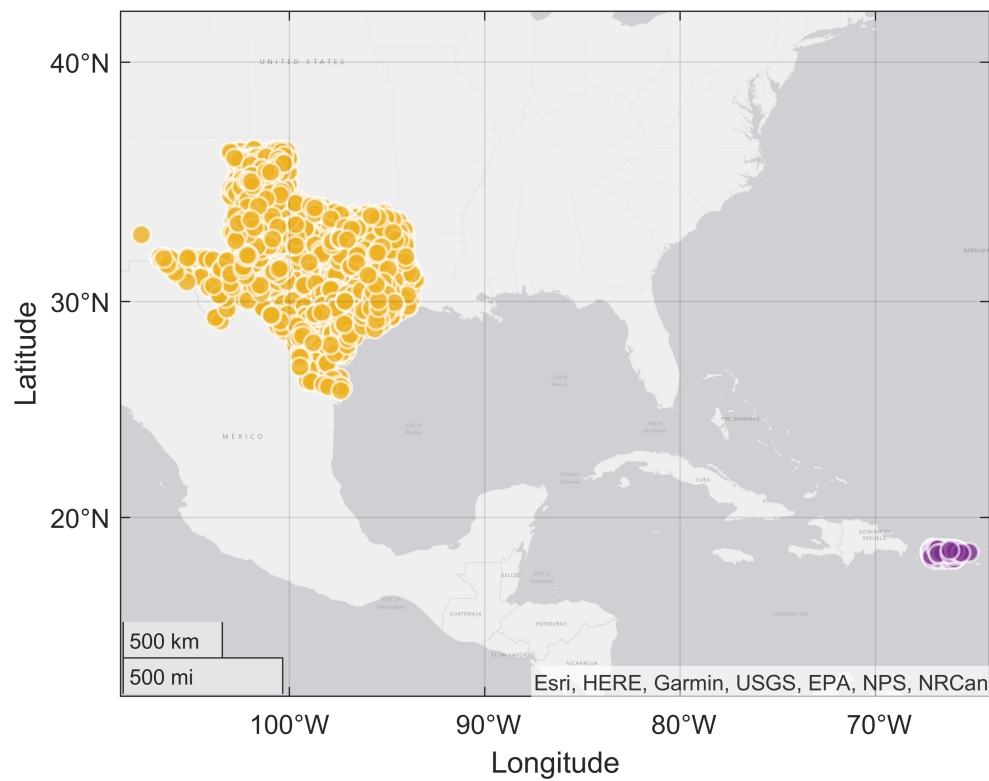


Figure of Event Locations

Show the location of events in the two states. Be sure to use different markers for the two states

```
geobubble(Data2.Begin_Lat,Data2.Begin_Lon,ColorData=Data2.State)
```



Analysis

Three Counties with Most Events in State 1

Either type out, show in a table, or show in a clear visualization the three counties with the most events in state 1.

```
Data3 = Data2(Data2.State == 'TEXAS',:)
```

Data3 = 3628x25 table

	EpisodeID	Event_ID	State	Year	Month	Event_Type	CZ_Name
1	115737	695622	TEXAS	2017	May	Hail	HENDERSON
2	111748	666464	TEXAS	2017	January	Tornado	BOSQUE
3	112430	672657	TEXAS	2017	January	Thunderstorm Wind	DALLAS
4	112430	672660	TEXAS	2017	January	Thunderstorm Wind	LEON
5	112430	672661	TEXAS	2017	January	Thunderstorm Wind	ELLIS

	EpisodeID	Event_ID	State	Year	Month	Event_Type	CZ_Name
6	112430	672744	TEXAS	2017	January	Thunderstorm Wind	LEON
7	112430	672745	TEXAS	2017	January	Thunderstorm Wind	RAINS
8	111748	673560	TEXAS	2017	January	Hail	JOHNSON
9	111748	673561	TEXAS	2017	January	Hail	TARRANT
10	111748	673566	TEXAS	2017	January	Thunderstorm Wind	TARRANT
11	111748	673567	TEXAS	2017	January	Flash Flood	JOHNSON
12	111748	673568	TEXAS	2017	January	Thunderstorm Wind	TARRANT
13	111748	673569	TEXAS	2017	January	Thunderstorm Wind	COLLIN
14	111748	673571	TEXAS	2017	January	Thunderstorm Wind	DALLAS
15	111748	673575	TEXAS	2017	January	Thunderstorm Wind	DALLAS
16	112430	670264	TEXAS	2017	January	Thunderstorm Wind	CORYELL
17	112430	672746	TEXAS	2017	January	Thunderstorm Wind	ANDERSON
18	111748	673576	TEXAS	2017	January	Thunderstorm Wind	COLLIN
19	111748	673578	TEXAS	2017	January	Thunderstorm Wind	HUNT
20	111748	673579	TEXAS	2017	January	Flood	TARRANT
21	111748	675279	TEXAS	2017	January	Hail	TARRANT
22	111748	739562	TEXAS	2017	January	Tornado	BOSQUE
23	112430	672747	TEXAS	2017	January	Thunderstorm Wind	HUNT
24	112430	673519	TEXAS	2017	January	Lightning	COLLIN
25	111748	673531	TEXAS	2017	January	Thunderstorm Wind	JOHNSON
26	112430	672654	TEXAS	2017	January	Thunderstorm Wind	DALLAS
27	112430	672655	TEXAS	2017	January	Thunderstorm Wind	KAUFMAN
28	112430	670265	TEXAS	2017	January	Thunderstorm Wind	MCLENNAN
29	112430	670266	TEXAS	2017	January	Thunderstorm Wind	HAMILTON
30	112430	670267	TEXAS	2017	January	Thunderstorm Wind	MCLENNAN
31	112430	670268	TEXAS	2017	January	Thunderstorm Wind	MCLENNAN
32	112430	672371	TEXAS	2017	January	Thunderstorm Wind	JOHNSON
33	112430	672656	TEXAS	2017	January	Thunderstorm Wind	NAVARRO
34	112430	672372	TEXAS	2017	January	Thunderstorm Wind	HILL
35	112430	672373	TEXAS	2017	January	Thunderstorm Wind	DALLAS
36	112761	673538	TEXAS	2017	January	Drought	LAMAR
37	112761	673541	TEXAS	2017	January	Drought	FANNIN
38	112761	673543	TEXAS	2017	January	Drought	DELTA

	EpisodeID	Event_ID	State	Year	Month	Event_Type	CZ_Name
39	111748	673556	TEXAS	2017	January	Thunderstorm Wind	JOHNSON
40	111748	673557	TEXAS	2017	January	Thunderstorm Wind	JOHNSON
41	111748	673558	TEXAS	2017	January	Thunderstorm Wind	JOHNSON
42	111748	673559	TEXAS	2017	January	Thunderstorm Wind	JOHNSON
43	112430	672653	TEXAS	2017	January	Thunderstorm Wind	NAVARRO
44	116163	698160	TEXAS	2017	May	Thunderstorm Wind	LA SALLE
45	116163	698165	TEXAS	2017	May	Hail	DUVAL
46	113061	676044	TEXAS	2017	March	Hail	LUBBOCK
47	116163	698174	TEXAS	2017	May	Hail	DUVAL
48	116163	698176	TEXAS	2017	May	Hail	DUVAL
49	113755	683996	TEXAS	2017	March	Hail	DENTON
50	111748	666465	TEXAS	2017	January	Tornado	HILL
51	112761	673542	TEXAS	2017	January	Drought	HUNT
52	111748	673551	TEXAS	2017	January	Thunderstorm Wind	CORYELL
53	111748	666463	TEXAS	2017	January	Tornado	BOSQUE
54	111748	666467	TEXAS	2017	January	Tornado	TARRANT
55	111748	666466	TEXAS	2017	January	Tornado	JOHNSON
56	111823	666964	TEXAS	2017	January	Hail	EDWARDS
57	111823	666961	TEXAS	2017	January	Hail	VAL VERDE
58	111823	666965	TEXAS	2017	January	Hail	EDWARDS
59	111823	666967	TEXAS	2017	January	Hail	EDWARDS
60	111823	666973	TEXAS	2017	January	Hail	REAL
61	111823	666969	TEXAS	2017	January	Hail	EDWARDS
62	111823	666970	TEXAS	2017	January	Hail	EDWARDS
63	111823	666971	TEXAS	2017	January	Hail	REAL
64	111823	666972	TEXAS	2017	January	Hail	REAL
65	116180	698341	TEXAS	2017	May	Hail	BEE
66	116180	698342	TEXAS	2017	May	Hail	SAN PATRI...
67	116180	698357	TEXAS	2017	May	Thunderstorm Wind	ARANSAS
68	116180	698348	TEXAS	2017	May	Hail	ARANSAS
69	122668	734756	TEXAS	2017	December	Frost/Freeze	JIM HOGG
70	122668	734757	TEXAS	2017	December	Frost/Freeze	ZAPATA
71	122668	734758	TEXAS	2017	December	Frost/Freeze	STARR

	EpisodeID	Event_ID	State	Year	Month	Event_Type	CZ_Name
72	122668	734754	TEXAS	2017	December	Frost/Freeze	BROOKS
73	122667	734753	TEXAS	2017	December	Drought	JIM HOGG
74	116180	698332	TEXAS	2017	May	Hail	MCMULLEN
75	116180	698336	TEXAS	2017	May	Hail	MCMULLEN
76	122621	734439	TEXAS	2017	December	Heavy Snow	JIM HOGG
77	122621	734448	TEXAS	2017	December	Heavy Snow	STARR
78	122668	734755	TEXAS	2017	December	Frost/Freeze	KENEDY
79	122621	734432	TEXAS	2017	December	Heavy Snow	ZAPATA
80	116772	702260	TEXAS	2017	June	Thunderstorm Wind	DE WITT
81	121163	725356	TEXAS	2017	October	Hail	HARDEMAN
82	121163	725357	TEXAS	2017	October	Hail	HARDEMAN
83	112873	674292	TEXAS	2017	February	High Wind	CARSON
84	112873	674284	TEXAS	2017	February	High Wind	HANSFORD
85	112873	674288	TEXAS	2017	February	High Wind	ROBERTS
86	121163	725358	TEXAS	2017	October	Hail	WICHITA
87	121163	725359	TEXAS	2017	October	Hail	WICHITA
88	121163	725360	TEXAS	2017	October	Hail	WICHITA
89	121163	725361	TEXAS	2017	October	Thunderstorm Wind	WICHITA
90	112873	674285	TEXAS	2017	February	High Wind	OCHILTREE
91	112873	674286	TEXAS	2017	February	High Wind	MOORE
92	112873	674283	TEXAS	2017	February	High Wind	SHERMAN
93	112873	674287	TEXAS	2017	February	High Wind	HUTCHINSON
94	112873	674291	TEXAS	2017	February	High Wind	RANDALL
95	114276	684615	TEXAS	2017	April	Hail	WOOD
96	117801	708162	TEXAS	2017	June	Flash Flood	NUECES
97	117801	708163	TEXAS	2017	June	Flash Flood	NUECES
98	118934	714519	TEXAS	2017	June	Hail	NUECES
99	118934	714523	TEXAS	2017	June	Hail	ARANSAS
100	118934	714525	TEXAS	2017	June	Hail	ARANSAS

⋮

```
Data4 = Data3(ismember(Data3.CZ_Name,{'ANGELINA','ARMSTRONG','BANDERA'}),:)
```

Data4 = 67×25 table

...

	EpisodeID	Event_ID	State	Year	Month	Event_Type	CZ_Name
1	112873	674295	TEXAS	2017	February	High Wind	ARMSTRONG
2	111823	668561	TEXAS	2017	January	Hail	BANDERA
3	111823	668564	TEXAS	2017	January	Hail	BANDERA
4	111823	668565	TEXAS	2017	January	Hail	BANDERA
5	111823	668567	TEXAS	2017	January	Hail	BANDERA
6	111823	668566	TEXAS	2017	January	Hail	BANDERA
7	111823	668568	TEXAS	2017	January	Hail	BANDERA
8	111823	668569	TEXAS	2017	January	Hail	BANDERA
9	111823	668570	TEXAS	2017	January	Hail	BANDERA
10	111823	668571	TEXAS	2017	January	Hail	BANDERA
11	113580	679875	TEXAS	2017	March	Thunderstorm Wind	ANGELINA
12	113580	679882	TEXAS	2017	March	Thunderstorm Wind	ANGELINA
13	114702	687990	TEXAS	2017	May	Hail	ANGELINA
14	114702	687991	TEXAS	2017	May	Hail	ANGELINA
15	114582	687210	TEXAS	2017	March	High Wind	ARMSTRONG
16	114641	687623	TEXAS	2017	March	High Wind	ARMSTRONG
17	115864	696330	TEXAS	2017	May	Frost/Freeze	ARMSTRONG
18	114818	688701	TEXAS	2017	March	Thunderstorm Wind	ARMSTRONG
19	114702	687989	TEXAS	2017	May	Hail	ANGELINA
20	114304	684819	TEXAS	2017	April	Hail	ANGELINA
21	114369	685320	TEXAS	2017	May	Hail	ANGELINA
22	114369	685362	TEXAS	2017	May	Hail	ANGELINA
23	114369	685377	TEXAS	2017	May	Hail	ANGELINA
24	114369	685380	TEXAS	2017	May	Flash Flood	ANGELINA
25	114369	685381	TEXAS	2017	May	Thunderstorm Wind	ANGELINA
26	114369	685382	TEXAS	2017	May	Thunderstorm Wind	ANGELINA
27	114369	685384	TEXAS	2017	May	Hail	ANGELINA
28	114369	685385	TEXAS	2017	May	Hail	ANGELINA
29	114369	685379	TEXAS	2017	May	Tornado	ANGELINA
30	116530	700736	TEXAS	2017	May	Hail	ARMSTRONG
31	115166	691481	TEXAS	2017	May	Thunderstorm Wind	ANGELINA
32	116530	700743	TEXAS	2017	May	Hail	ARMSTRONG
33	116530	700746	TEXAS	2017	May	Tornado	ARMSTRONG

	EpisodeID	Event_ID	State	Year	Month	Event_Type	CZ_Name
34	122186	731443	TEXAS	2017	December	Winter Weather	BANDERA
35	114304	684810	TEXAS	2017	April	Hail	ANGELINA
36	114304	684811	TEXAS	2017	April	Hail	ANGELINA
37	114304	684812	TEXAS	2017	April	Hail	ANGELINA
38	114304	684814	TEXAS	2017	April	Hail	ANGELINA
39	114304	684816	TEXAS	2017	April	Hail	ANGELINA
40	114304	684818	TEXAS	2017	April	Hail	ANGELINA
41	114304	684806	TEXAS	2017	April	Hail	ANGELINA
42	116772	702264	TEXAS	2017	June	Thunderstorm Wind	BANDERA
43	115656	694959	TEXAS	2017	April	Hail	ARMSTRONG
44	115656	694960	TEXAS	2017	April	Hail	ARMSTRONG
45	115656	694961	TEXAS	2017	April	Hail	ARMSTRONG
46	117951	709037	TEXAS	2017	June	Thunderstorm Wind	ARMSTRONG
47	117756	708015	TEXAS	2017	June	Excessive Heat	ARMSTRONG
48	119293	716337	TEXAS	2017	August	Thunderstorm Wind	ARMSTRONG
49	118330	711050	TEXAS	2017	August	Flash Flood	ANGELINA
50	118330	711054	TEXAS	2017	August	Flash Flood	ANGELINA
51	118330	711059	TEXAS	2017	August	Flash Flood	ANGELINA
52	118330	711060	TEXAS	2017	August	Flash Flood	ANGELINA
53	118330	711063	TEXAS	2017	August	Flash Flood	ANGELINA
54	118330	711083	TEXAS	2017	August	Flash Flood	ANGELINA
55	118330	711089	TEXAS	2017	August	Flash Flood	ANGELINA
56	118330	711090	TEXAS	2017	August	Flash Flood	ANGELINA
57	118330	711412	TEXAS	2017	August	Flash Flood	ANGELINA
58	118325	711038	TEXAS	2017	August	Thunderstorm Wind	ANGELINA
59	118915	714371	TEXAS	2017	August	Tropical Storm	ANGELINA
60	117573	707061	TEXAS	2017	August	Heat	ANGELINA
61	119296	716341	TEXAS	2017	August	Flash Flood	ARMSTRONG
62	117890	708496	TEXAS	2017	August	Heat	ANGELINA
63	121069	724760	TEXAS	2017	December	Winter Weather	ANGELINA
64	117040	703969	TEXAS	2017	July	Heat	ANGELINA
65	117028	703885	TEXAS	2017	July	Heat	ANGELINA
66	116545	700819	TEXAS	2017	July	Thunderstorm Wind	ANGELINA

	EpisodeID	Event_ID	State	Year	Month	Event_Type	CZ_Name
67	117037	703942	TEXAS	2017	July	Heat	ANGELINA

1. Angelina - 41
2. Armstrong -15
3. Bandera -11

Three Counties with Most Events in State 2

Either type out, show in a table, or show in a clear visualization the three counties with the most events in state 2.

```
Data5 = Data2(Data2.State == 'PUERTO RICO',:)
```

```
Data5 = sortrows(Data5, 'CZ_Name');
```

```
Data5 = Data5(ismember(Data5.CZ_Name, {'GUAYNABO', 'MAYAGUEZ', 'NAGUABO', 'SAN JUAN'}),:)
```

Data5 = 51x25 table | Reduced from 222 rows

	EpisodeID	Event_ID	State	Year	Month	Event_Type	CZ_Name
1	120357	721928	PUERTO R...	2017	September	Flash Flood	GUAYNABO
2	120238	720480	PUERTO R...	2017	August	Flash Flood	MAYAGUEZ
3	120238	720490	PUERTO R...	2017	August	Flood	MAYAGUEZ
4	119960	718989	PUERTO R...	2017	August	Flood	SAN JUAN
5	120238	720414	PUERTO R...	2017	August	Flash Flood	MAYAGUEZ
6	120238	720475	PUERTO R...	2017	August	Flood	MAYAGUEZ
7	120238	720476	PUERTO R...	2017	August	Flash Flood	MAYAGUEZ
8	120238	720478	PUERTO R...	2017	August	Flash Flood	MAYAGUEZ
9	119960	719011	PUERTO R...	2017	August	Flash Flood	NAGUABO
10	120238	720401	PUERTO R...	2017	August	Flood	MAYAGUEZ
11	119954	718922	PUERTO R...	2017	August	Flood	MAYAGUEZ
12	120238	720492	PUERTO R...	2017	August	Flash Flood	MAYAGUEZ
13	120238	720495	PUERTO R...	2017	August	Flood	MAYAGUEZ
14	120238	720502	PUERTO R...	2017	August	Flash Flood	MAYAGUEZ
15	119215	715884	PUERTO R...	2017	July	Heavy Rain	SAN JUAN
16	119156	715610	PUERTO R...	2017	July	Flood	SAN JUAN
17	119156	715611	PUERTO R...	2017	July	Flood	SAN JUAN
18	119156	715612	PUERTO R...	2017	July	Flood	GUAYNABO

	EpisodeID	Event_ID	State	Year	Month	Event_Type	CZ_Name
19	119156	715615	PUERTO R...	2017	July	Flood	GUAYNABO
20	119215	715882	PUERTO R...	2017	July	Flash Flood	GUAYNABO
21	119215	715883	PUERTO R...	2017	July	Flash Flood	GUAYNABO
22	120238	720378	PUERTO R...	2017	August	Heavy Rain	MAYAGUEZ
23	120238	720412	PUERTO R...	2017	August	Flood	MAYAGUEZ
24	120238	720380	PUERTO R...	2017	August	Heavy Rain	MAYAGUEZ
25	115705	696272	PUERTO R...	2017	April	Flash Flood	NAGUABO
26	117892	708505	PUERTO R...	2017	June	Flash Flood	GUAYNABO
27	117892	708507	PUERTO R...	2017	June	Flash Flood	GUAYNABO
28	117892	708510	PUERTO R...	2017	June	Flash Flood	SAN JUAN
29	117892	709391	PUERTO R...	2017	June	Flash Flood	SAN JUAN
30	114799	695344	PUERTO R...	2017	April	Flood	NAGUABO
31	119159	715760	PUERTO R...	2017	July	Heavy Rain	NAGUABO
32	119159	715755	PUERTO R...	2017	July	Heavy Rain	NAGUABO
33	119159	715762	PUERTO R...	2017	July	Flash Flood	NAGUABO
34	119156	715609	PUERTO R...	2017	July	Flood	SAN JUAN
35	119159	715791	PUERTO R...	2017	July	Flash Flood	NAGUABO
36	119159	715793	PUERTO R...	2017	July	Flash Flood	NAGUABO
37	119159	715805	PUERTO R...	2017	July	Heavy Rain	NAGUABO
38	119159	715881	PUERTO R...	2017	July	Flash Flood	NAGUABO
39	119159	715893	PUERTO R...	2017	July	Heavy Rain	NAGUABO
40	119159	715627	PUERTO R...	2017	July	Flash Flood	NAGUABO
41	121702	728500	PUERTO R...	2017	November	Flood	GUAYNABO
42	121700	728490	PUERTO R...	2017	November	Flood	SAN JUAN
43	121702	728498	PUERTO R...	2017	November	Flood	GUAYNABO
44	121702	728599	PUERTO R...	2017	November	Flash Flood	GUAYNABO
45	121172	725392	PUERTO R...	2017	October	Funnel Cloud	SAN JUAN
46	121222	725752	PUERTO R...	2017	October	Flash Flood	SAN JUAN
47	119955	718933	PUERTO R...	2017	August	Thunderstorm Wind	SAN JUAN
48	119955	718924	PUERTO R...	2017	August	Funnel Cloud	GUAYNABO
49	119955	718925	PUERTO R...	2017	August	Funnel Cloud	SAN JUAN
50	119955	718930	PUERTO R...	2017	August	Funnel Cloud	SAN JUAN
51	120356	721845	PUERTO R...	2017	September	Flash Flood	GUAYNABO

1. Mayaguez - 14
2. San Juan - 13
3. Guaynabo - 12
4. Naguabo - 12

Three Counties with Highest Property Cost in State 1

Either type out, show in a table, or show in a clear visualization the three counties with the highest reported property cost in state 1. *Be sure to include the dollar amount.*

```
Data2;
Data6 = Data2(~ismissing(Data2.Property_Cost),:);
Data6 = Data6(Data6.State == 'TEXAS',:);
Data6 = Data6(Data6.Property_Cost~=0,:);
G1 = groupsummary(Data6,"CZ_Name","sum","Property_Cost")
```

G1 = 169x3 table

	CZ_Name	GroupCount	sum_Property_Cost
1	ANDERSON	1	5000
2	ANDREWS	1	6000
3	ANGELINA	1	100000
4	ARANSAS	7	1.9504e+09
5	ARCHER	1	8000
6	AUSTIN	2	1100000
7	BAILEY	3	422000
8	BASTROP	4	1705000
9	BEE	8	5150000
10	BELL	5	130000
11	BEXAR	3	310000
12	BLANCO	1	5000
13	BORDEN	1	20000
14	BOSQUE	6	309000
15	BRAZORIA	11	2.0015e+09
16	BRAZOS	2	15000300
17	BRISCOE	2	35000

	CZ_Name	GroupCount	sum_Property_Cost
18	BURLESON	2	20025000
19	BURNET	2	11000
20	CALDWELL	2	12855000
21	CALHOUN	4	281010000
22	CAMERON	4	37000
23	CASS	1	25000
24	CASTRO	6	1091000
25	CHAMBERS	3	1023000
26	CHEROKEE	1	120000
27	CHILDRESS	2	2070000
28	COLLIN	34	2702000
29	COLORADO	1	9000
30	COMAL	1	1000000
31	COOKE	5	214000
32	CORYELL	3	305000
33	CRANE	1	7000
34	CROSBY	1	1500000
35	DALLAS	16	651000
36	DE WITT	4	3115000
37	DELTA	1	75000
38	DENTON	29	2908000
39	DICKENS	2	80000
40	DUVAL	1	25000
41	EASTLAND	1	10000
42	ECTOR	19	208149500
43	EDWARDS	2	10000
44	EL PASO	4	175000
45	ELLIS	11	29000
46	ERATH	3	64000
47	FALLS	2	10000
48	FANNIN	3	12000
49	FAYETTE	2	50001000
50	FLOYD	1	25000

	CZ_Name	GroupCount	sum_Property_Cost
51	FORT BEND	16	1.6006e+10
52	FREESTONE	1	1000
53	GAINES	1	2000
54	GALVESTON	13	2.0000e+10
55	GLASSCOCK	3	58000
56	GOLIAD	6	1270000
57	GONZALES	2	110000
58	GRAYSON	7	125000
59	GREGG	5	885100
60	GRIMES	1	50000000
61	GUADALUPE	1	50000
62	HALE	2	130000
63	HALL	4	2555000
64	HANSFORD	1	2800000
65	HARDIN	2	600002000
66	HARRIS	23	1.0002e+10
67	HARRISON	2	1090000
68	HAYS	2	600000
69	HEMPHILL	1	2300000
70	HENDERSON	10	821500
71	HIDALGO	3	35500
72	HILL	11	336000
73	HOCKLEY	8	4629000
74	HOOD	2	15000
75	HOPKINS	4	45000
76	HOUSTON	6	233000
77	HOWARD	1	1500
78	HUDSPETH	3	2030000
79	HUNT	4	17000
80	HUTCHINSON	1	1200000
81	JACK	2	7000
82	JACKSON	4	500203000
83	JASPER	8	85108000

	CZ_Name	GroupCount	sum_Property_Cost
84	JEFFERSON	6	3.0000e+09
85	JIM WELLS	1	1000
86	JOHNSON	12	110000
87	KAUFMAN	5	214000
88	KENDALL	2	30000
89	KENT	1	30000
90	KERR	1	5000
91	KLEBERG	2	35000
92	LA SALLE	2	150000
93	LAMAR	2	62000
94	LAMB	3	10025000
95	LAVACA	1	100000
96	LEE	3	360000
97	LEON	8	47000
98	LIBERTY	2	1.0000e+09
99	LIMESTONE	6	314000
100	LIPSCOMB	1	2200000

⋮

```
[G11,id11] = sort(G1.sum_Property_Cost, 'descend');
G1 = G1(id11,:)
```

G1 = 169x3 table

	CZ_Name	GroupCount	sum_Property_Cost
1	GALVESTON	13	2.0000e+10
2	FORT BEND	16	1.6006e+10
3	MONTGOMERY	2	1.4000e+10
4	HARRIS	23	1.0002e+10
5	JEFFERSON	6	3.0000e+09
6	BRAZORIA	11	2.0015e+09
7	ARANSAS	7	1.9504e+09
8	ORANGE	1	1.5000e+09
9	NUECES	15	1.3016e+09
10	WALKER	6	1.2000e+09
11	LIBERTY	2	1.0000e+09

	CZ_Name	GroupCount	sum_Property_Cost
12	SAN JACINTO	2	700000000
13	POLK	4	600050000
14	HARDIN	2	600002000
15	SAN PATRI...	9	502505000
16	MATAGORDA	3	501400000
17	JACKSON	4	500203000
18	REFUGIO	3	500030000
19	WALLER	4	350705000
20	CALHOUN	4	281010000
21	ECTOR	19	208149500
22	WHARTON	4	200360000
23	VICTORIA	4	160035000
24	WASHINGTON	1	150000000
25	JASPER	8	85108000
26	MADISON	2	80010000
27	TYLER	4	60085000
28	FAYETTE	2	50001000
29	GRIMES	1	50000000
30	NEWTON	5	45134000
31	OCHILTREE	2	30800000
32	WEBB	16	20980000
33	BURLESON	2	20025000
34	BRAZOS	2	15000300
35	CALDWELL	2	12855000
36	LAMB	3	10025000
37	TOM GREEN	2	7030000
38	LUBBOCK	7	6388500
39	BEE	8	5150000
40	HOCKLEY	8	4629000
41	MITCHELL	11	3143800
42	DE WITT	4	3115000
43	DENTON	29	2908000
44	HANSFORD	1	2800000

	CZ_Name	GroupCount	sum_Property_Cost
45	COLLIN	34	2702000
46	TRAVIS	10	2588000
47	HALL	4	2555000
48	HEMPHILL	1	2300000
49	LIPSCOMB	1	2200000
50	CHILDRESS	2	2070000
51	HUDSPETH	3	2030000
52	BASTROP	4	1705000
53	VAN ZANDT	7	1672000
54	CROSBY	1	1500000
55	TARRANT	26	1348000
56	WILLIAMSON	7	1346000
57	GOLIAD	6	1270000
58	HUTCHINSON	1	1200000
59	AUSTIN	2	1100000
60	CASTRO	6	1091000
61	HARRISON	2	1090000
62	MARION	2	1050000
63	CHAMBERS	3	1023000
64	COMAL	1	1000000
65	GREGG	5	885100
66	HENDERSON	10	821500
67	RUSK	8	735100
68	DALLAS	16	651000
69	HAYS	2	600000
70	NACOGDOCHES	1	500000
71	PANOLA	1	500000
72	THROCKMOR...	1	460000
73	BAILEY	3	422000
74	LEE	3	360000
75	HILL	11	336000
76	LIMESTONE	6	314000
77	BEXAR	3	310000

	CZ_Name	GroupCount	sum_Property_Cost
78	BOSQUE	6	309000
79	CORYELL	3	305000
80	HOUSTON	6	233000
81	SWISHER	2	220000
82	COOKE	5	214000
83	KAUFMAN	5	214000
84	WISE	6	200000
85	WHEELER	1	188000
86	SAN AUGUS...	3	175800
87	EL PASO	4	175000
88	LA SALLE	2	150000
89	BELL	5	130000
90	HALE	2	130000
91	GRAYSON	7	125000
92	WICHITA	5	121000
93	CHEROKEE	1	120000
94	MIDLAND	14	118700
95	GONZALES	2	110000
96	JOHNSON	12	110000
97	MCLENNAN	10	108500
98	ROCKWALL	3	103000
99	ANGELINA	1	100000
100	LAVACA	1	100000

⋮

1. Galveston 2*10¹⁰ \$
2. Fort Bend 1.6*10¹⁰ \$
3. Montgome 1.4*10¹⁰ \$
- 4.

Three Counties with Highest Property Cost in State 2

Either type out, show in a table, or show in a clear visualization the three counties with the highest reported property cost in state 2. *Be sure to include the dollar amount.*

```
Data7 = Data2(~ismissing(Data2.Property_Cost),:);
Data7 = Data7(Data7.State == 'PUERTO RICO',:);
Data7 = Data7(Data7.Property_Cost~=0,:);
```

```
G2 = groupsummary(Data7,"CZ_Name","sum","Property_Cost");
[G22,id22] = sort(G2.sum_Property_Cost,'descend');
G2 = G2(id22,:)
```

G2 = 52x3 table

	CZ_Name	GroupCount	sum_Property_Cost
1	TOA BAJA	1	2.5000e+09
2	ADJUNTAS	3	750760000
3	CANOVANAS	2	750500000
4	CAGUAS	3	750350000
5	BAYAMON	3	750251000
6	ARECIBO	2	750250000
7	BARCELONETA	2	750250000
8	BARRANQUI...	2	750250000
9	CAMUY	2	750250000
10	CAROLINA	2	750250000
11	CATANO	2	750250000
12	CEIBA	2	750250000
13	UTUADO	2	750200000
14	AGUAS BUE...	2	750177000
15	AGUADILLA	2	750005000
16	AGUADA	1	750000000
17	AIBONITO	1	750000000
18	ANASCO	1	750000000
19	ARROYO	1	750000000
20	CABO ROJO	1	750000000
21	CAYEY	1	750000000
22	VEGA ALTA	1	750000000
23	PONCE	2	501000000
24	COMERIO	3	250510000
25	CENTRAL I...	6	3000000
26	EASTERN I...	4	2000000
27	HATILLO	3	2000000
28	GUAYNABO	3	1200000
29	CIALES	3	1010000
30	COROZAL	2	1000000

	CZ_Name	GroupCount	sum_Property_Cost
31	DORAD	2	1000000
32	FAJARDO	2	1000000
33	FLORIDA	2	1000000
34	GURABO	2	1000000
35	HUMACAO	2	1000000
36	JAYUYA	2	1000000
37	MAUNABO	1	1000000
38	CIDRA	1	500000
39	COAMO	1	500000
40	CULEBRA	1	500000
41	GUANICA	1	500000
42	GUAYAMA	1	500000
43	GUAYANILLA	1	500000
44	HORMIGUEROS	1	500000
45	ISABELA	1	500000
46	JUANA DIAZ	1	500000
47	MOCA	1	1000
48	PATILLAS	1	1000
49	SAN JUAN	1	1000
50	SAN SEBAS...	1	1000
51	NAGUABO	1	500
52	NORTHWEST	1	500

1. Toa Baja 2.5×10^{10} \$
2. Adjuntas 75076×10^4 \$
3. Canovanas 7505×10^5 \$

Conclusions and Recommendations

Summarize your analysis. Make a recommendation supported by the data.

Based on data analysis, Texas and Puerto Rico are the most devastated states of US hit by hurricane Harvey, in 2017.

Most of the resources should be spend in these two states. We have provided the list of most hit counties in these states.

