**SOURCE CODE**

[**Home.component.ts**](http://Home.component.ts)

**constructor**(**private** data: DataService) { }  
  
 ngOnInit() {  
 **this**.createLocationObject();  
 **this**.getDataFromService();  
 **this**.getHourlyDataFromService();  
 }  
 ForecastWeather = () =>{  
  
 **this**.createLocationObject();  
 **this**.getDataFromService();  
 **this**.removeData();  
 **this**.getHourlyDataFromService();  
  
 }  
 createLocationObject=()=>{  
  
 **this**.location = {state : **this**.state, city : **this**.city};  
  
 }  
 getDataFromService = ()=> {  
 **this**.data.getForecastData(**this**.location).subscribe( data => {  
 **this**.current\_report = data;  
 });  
 }  
 getHourlyDataFromService = ()=>{  
 **this**.data.getHourlyForecastData(**this**.location).subscribe(data=>{  
 **this**.generateHourlyReport(data);  
 **this**.generateChartArrays(**this**.hourly\_report);  
 **this**.generateHourlyChart();  
 });  
  
 }  
 generateHourlyReport= (data) =>{  
 data = data['hourly\_forecast'];  
 **let** obj=**null**;  
 **for**(**let** i = 0 ; i< 10 && data ; i++)  
 {  
 obj = {  
 temperature: data[i]['temp']['english'],  
 condition: data[i]['condition'],  
 image: data[i]['icon\_url'],  
 time:data[i]['FCTTIME']['civil']  
 }  
 **this**.hourly\_report.push(obj);  
 }  
  
 }  
 generateChartArrays =(data) =>{  
 **for**(**let** prop **in** data)  
 {  
 **this**.temperatureArray.push(data[prop]['temperature']);  
 **this**.timeArray.push(data[prop]['time']);  
 }  
 }  
 generateHourlyChart= () => {  
  
 **this**.chart = **new** Chart('canvas', {  
 type: 'line',  
 responsive:'true',  
 scaleFontColor: 'red',  
 data: {  
 labels: **this**.timeArray,  
 datasets: [  
 {  
 data: **this**.temperatureArray ,  
 borderColor: "white",  
 fill: **true** },  
  
 ]  
 },  
 options: {  
 legend: {  
 display: **false** },  
 scales: {  
 xAxes: [{  
 display: **true**,  
 ticks: {  
 fontColor: "white"  
 }  
 }],  
 yAxes: [{  
 display: **true**,  
 ticks: {  
 fontColor: "white",  
 callback: **function**(value, index, values) {  
 **return** value + ' F';  
 }  
 }  
 }],  
 }  
 }  
 });  
  
 }  
 removeData=()=> {  
 **this**.hourly\_report=[];  
 **this**.temperatureArray=[];  
 **this**.timeArray=[];  
 }  
  
}

**Temperature.component.ts**

@Component({  
 selector: 'app-temperature',  
 templateUrl: './temperature.component.html',  
 styleUrls: ['./temperature.component.css']  
})  
**export class** TemperatureComponent **implements** OnInit {  
  
 @Input() **public** current\_report;  
 @Input() **public** location;  
 @Input() **public** chart;  
 @Input() **public** hourly\_report;  
 **constructor**() { }  
  
 ngOnInit() {  
 }  
  
}