

GeohashTile移植

代码

https://github.com/oscourse-tsinghua/undergraduate-dbin2021/tree/main/src/smart_contract

移植过程

文件替换

- 将李炜琪代码中的 `geohash.js` 替换为新代码中的 `geohash-new.js`
- 补充其他缺少的代码文件

修改 `traffic.html`

- 修改文件开头的 `<style>` 标签及脚本文件引用

```
<script src="leaflet-src-Geohash.js"></script>
<script src="leaflet.label-src.js"></script>
<script src="leaflet.label.js"></script>
<script src="OSMBuildings-Leaflet.debug.js"></script>

<script src="/usr/lib/node_modules/web3/dist/web3.min.js"></script>
<script src="./geohash-new.js"></script>
<script src="./geolib.js"></script>
<script src="./common.js"></script>
<script src="GeohashLayer.GeoJSON.js"></script>
<script src="https://s3.pstatp.com/cdn/expire-1-M/jquery/3.2.1/jquery.min.js">
</script>

<script src="./gpsarray.js"></script>
<script src="./waysall.js"></script>
```

- 修改 `calcNext()` 函数中在地图上绘制点的方法

```
async function calcNext() {
  var geohash = locBuffer[nowCalc];
  // 原来的方法（添加原始数据点）
  // var range = decode_geohash(geohash);
  // var midLat = (range[2] + range[3]) / 2;
  // var midLon = (range[0] + range[1]) / 2;
  // var point = L.circle([midLat,midLon],3,
{color: '#FF0000',fillColor: '#FF0000',fillOpacity:1});
  // 现在的方法
  var point = L.polyline([geohash,geohash],
{color: '#FF0000',fillColor: '#FF0000',fillOpacity:1});
  map.addLayer(point);

  match(nowCalc);
  // 原来的方法（添加修正后数据点）
  // var range = decode_geohash(locBufferFix[nowCalc]);
  // var midLat = (range[2] + range[3]) / 2;
```

```

    // var midLon = (range[0] + range[1]) / 2;
    // var point = L.circle([midLat,midLon],3,
    {color: '#00FF00',fillColor: '#00FF00',fillOpacity:1});
    // 现在的方法
    var newgeohash = locBufferFix[nowCalc];
    var point = L.polyline([newgeohash,newgeohash],
    {color: '#00FF00',fillColor: '#00FF00',fillOpacity:1});
    map.addLayer(point);

    //...
}

```

- 删去原文件中有关地图显示的代码（在靠近文件末尾的部分）

```

<div id="mapDiv" style="width:1600px; height:1000px"></div>
<script>
    // ...
    // 删去以下部分
    initLeaflet();
    function initLeaflet() {
        map = L.map("mapDiv").setView([39.95844857,116.31668809],13);
        L.tileLayer('https://{s}.tile.openstreetmap.org/{z}/{x}/{y}.png',
        {attribution: '&copy; <a
href="https://www.openstreetmap.org/copyright">OpenStreetMap</a>
contributors'}).addTo(map);
    }
</script>

```

- 在原文件最后的 `<script>` 标签结束后，添加董斌仓库文件中地图显示相关代码（也在文件最后）

```

<div id="map"></div>
<script>
    // ...
</script>

```

效果示意



注意

- 目前与信誉计算部分没有冲突
- 在有鼠标或键盘干扰时，地图显示部分会报如下错误：

```
Uncaught TypeError: point is undefined leaflet-src-Geohash.js:593:4
    _add ...yi2021/code/leaflet-src-Geohash.js:593
    add ...yi2021/code/leaflet-src-Geohash.js:588
    layerPointToLatLng ...i2021/code/leaflet-src-Geohash.js:2039
    getCenter ...i2021/code/leaflet-src-Geohash.js:1924
    _addTilesFromCenterOut ...i2021/code/leaflet-src-Geohash.js:9647
    _update ...i2021/code/leaflet-src-Geohash.js:9637
    _update ...yi2021/code/GeohashLayer.GeoJSON.js:73
    wrapperFn ...yi2021/code/leaflet-src-Geohash.js:104
    wrapperFn ...yyi2021/code/leaflet-src-Geohash.js:99
    setTimeout handler*wrapperFn ...yyi2021/code/leaflet-src-Geohash.js:95
    wrapperFn ...yyi2021/code/leaflet-src-Geohash.js:99
    setTimeout handler*wrapperFn ...yyi2021/code/leaflet-src-Geohash.js:95
    wrapperFn ...yyi2021/code/leaflet-src-Geohash.js:99
    setTimeout handler*wrapperFn ...yyi2021/code/leaflet-src-Geohash.js:95
    wrapperFn ...yyi2021/code/leaflet-src-Geohash.js:99
    setTimeout handler*wrapperFn ...yyi2021/code/leaflet-src-Geohash.js:95
    wrapperFn ...vvi2021/code/leaflet-src-Geohash.js:99
```

可能与缩放功能相关