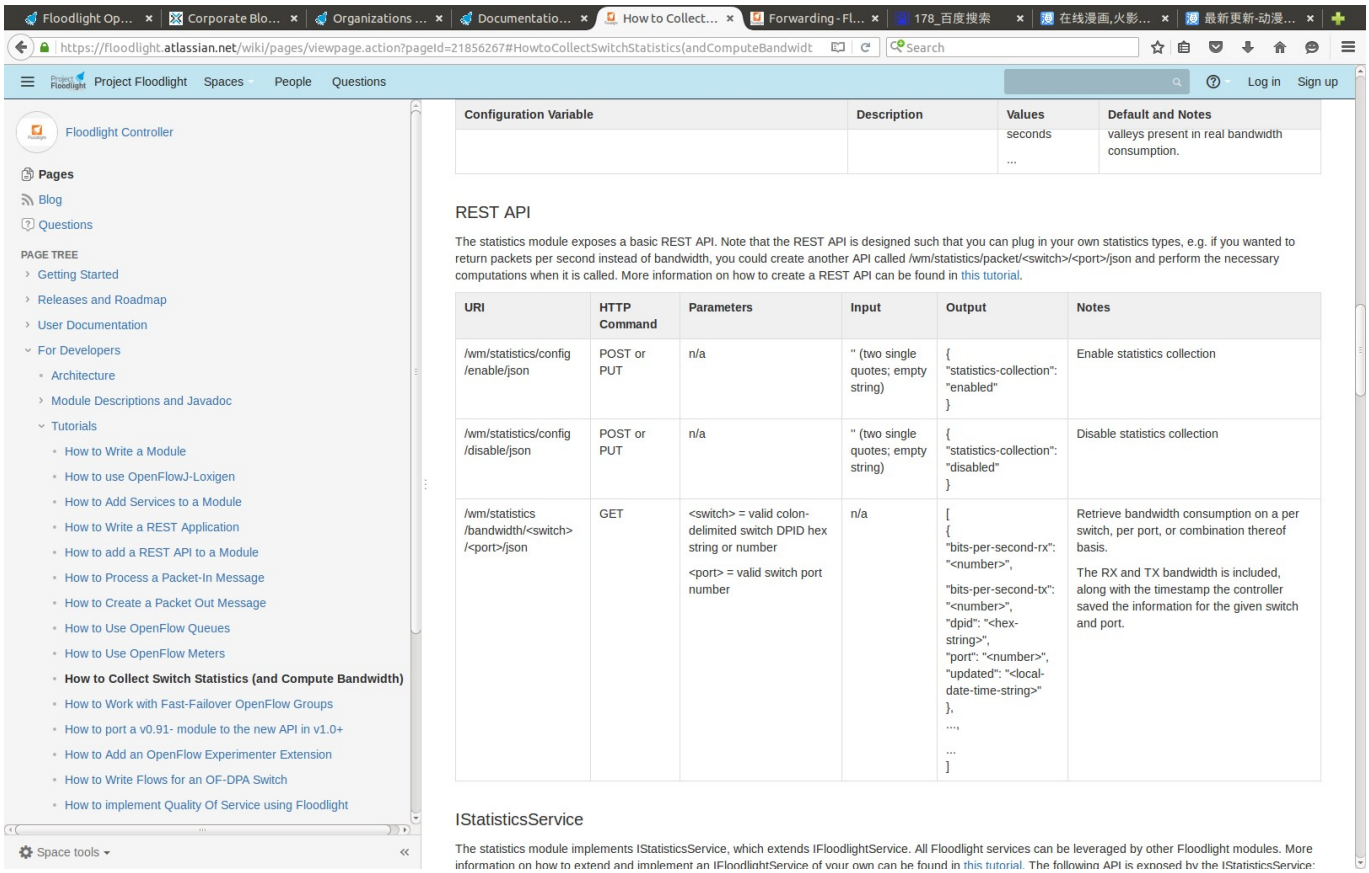
https://floodlight.atlassian.net/wiki/pages/viewpage.action?pageId=21856267#HowtoCollectSwitchStatistics%28andComputeBandwidth%29-Computingbandwidthconsumption



REST API

The statistics module exposes a basic REST API. Note that the REST API is designed such that you can plug in your own statistics types, e.g. if you wanted to return packets per second instead of bandwidth, you could create another API called /wm/statistics/packet/<switch>/<port>/json and perform the necessary computations when it is called. More information on how to create a REST API can be found in this tutorial.

/wm/statistics/config/enable/json	POST or PUT	n/a	'' (two single quotes; empty string)	{ "statistics-collection": "enabled" }	Enable statistics collection
/wm/statistics/config/disable/json	POST or PUT	n/a	'' (two single quotes; empty string)	{ "statistics-collection": "disabled" }	Disable statistics collection
				[{	Retrieve

/wm/statistics/bandwidth/<switch>/<port>/json	GET	<switch> = valid colon-delimited switch DPID hex string or number <port> = valid switch port number	n/a	"bits-per-second-rx": " <number>", "bits-per-second-tx": " <number>", "dpid": " <hex-string>", "port": " <number>", "updated": " <local-date-time-string>" }, ..., ...]	bandwidth consumption on a per switch, per port, or combination thereof basis. The RX and TX bandwidth is included, along with the timestamp the controller saved the information for the given switch and port.

使用curl GET :
curl http://localhost:8080/wm/tatistics/bandwidth/00:00:00:00:00:00:00:01/2/json
结果result:
{"globalError":false,"redirection":false,"recoverableError":false,"name":"Not Found","error":true,"serverError":false,"connectorError":false,"clientError":true,"throwable":null,"description":"The server has not found anything matching the request URI","success":false,"informational":false,"code":404,"reasonPhrase":"Not Found","uri":"http://www.w3.org/Protocols/rfc2616/rfc2616-sec10.html#sec10.4.5"}

floodlight DEBUG output:
13:34:55.244 [Dispatcher-0] DEBUG LogService - Processing request to: "http://localhost:8080/wm/statistics/bandwidth/00:00:00:00:00:00:00:01/2/json"
13:34:55.245 [Dispatcher-0] DEBUG org.restlet.Component.ServerRouter - Default virtual host selected
13:34:55.245 [Dispatcher-0] DEBUG org.restlet.Component.ServerRouter - Base URI: "http://localhost:8080". Remaining part: "/wm/statistics/bandwidth/00:00:00:00:00:00:00:01/2/json"
13:34:55.245 [Dispatcher-0] DEBUG org.restlet.VirtualHost - Selected route: "" -> net.floodlightcontroller.restserver.RestApiServer$RestApplication@8bb5566
13:34:55.246 [Dispatcher-0] DEBUG org.restlet - The default route was selected
13:34:55.247 [Dispatcher-0] INFO LogService - 2016-01-31 13:34:55 127.0.0.1 - - 8080 GET /wm/statistics/bandwidth/00:00:00:00:00:00:00:01/2/json - 404 - 0 2

http://localhost:8080 curl/7.35.0 -

Payless net.floodlightcontroller.netmonitor NetMonitorWebRoutable.java

```
public class NetMonitorWebRoutable implements RestletRoutable {

    public Restlet getRestlet(Context context) {
        Router router = new Router(context);
        router.attach("/linkstat/json", NetMonitorResource.class);
        return router;
    }

    public String basePath() {
        return "/wm/netmonitor";
    }

}
```

使用curl GET:

curl http://127.0.0.1:8080/wm/netmonitor/linkstat/json

结果result:

{}

（一直在ping h1 h2）