

GPU burn 测试gpu

1. 下载软件

```
wget https://codeload.github.com/wilicc/gpu-burn/zip/master
```

2. 解压缩

```
unzip gpu-burn-master.zip
```

3. 进入目录编译(确保cuda环境变量已经配置成功 nvcc -v能显示结果)

```
cd gpu-burn-master  
make
```

4. 编译成功后,会在当前目录生成 gpu_burn 这个文件

```
gpu_burn
```

5. 默认执行,跑全部GPU卡,空格后面参数为时间,一般快速测试设置100,稳定性测试为500

```
[root@localhost gpu-burn-master]# ./gpu_burn 100  
GPU 0: GeForce GTX 1080 Ti (UUID: GPU-6250466c-35ed-c279-fc0b-3b9b613a586f)  
GPU 1: GeForce GTX 1080 Ti (UUID: GPU-0a4a2b9c-d32c-1ba2-42a0-151ed9907d57)  
GPU 2: GeForce GTX 1080 Ti (UUID: GPU-f6cf184f-9173-1edd-648f-71e841afe152)  
GPU 3: GeForce GTX 1080 Ti (UUID: GPU-044f96e6-cc66-cc93-6283-07b829216f91)  
Initialized device 2 with 11178 MB of memory (10993 MB available, using 9894 MB  
of it), using FLOATS  
Initialized device 1 with 11178 MB of memory (10993 MB available, using 9894 MB  
of it), using FLOATS  
Initialized device 3 with 11178 MB of memory (10993 MB available, using 9894 MB  
of it), using FLOATS  
Initialized device 0 with 11178 MB of memory (10993 MB available, using 9894 MB  
of it), using FLOATS
```

6. 可以指定某几张卡跑,比如指定0和1号卡

```
export CUDA_VISIBLE_DEVICES=0,1  
./gpu_burn 100
```

```
[root@localhost gpu-burn-master]# ./gpu_burn 100  
GPU 0: GeForce GTX 1080 Ti (UUID: GPU-6250466c-35ed-c279-fc0b-3b9b613a586f)  
GPU 1: GeForce GTX 1080 Ti (UUID: GPU-0a4a2b9c-d32c-1ba2-42a0-151ed9907d57)  
GPU 2: GeForce GTX 1080 Ti (UUID: GPU-f6cf184f-9173-1edd-648f-71e841afe152)  
GPU 3: GeForce GTX 1080 Ti (UUID: GPU-044f96e6-cc66-cc93-6283-07b829216f91)  
Initialized device 0 with 11178 MB of memory (10993 MB available, using 9894 MB of it), using FLOATS  
3.0% proc'd: 1232 (8415 Gflop/s) - 1232 (8504 Gflop/s) errors: 0 - 0 temps: 55 C - 56 C █
```

如何找出故障卡

1. `dmesg -l err` 筛选出错误卡的Bus-Id

```
[211554.110457] NVRM: Xid (PCI:0000:85:00): 62, 0a7c(2a9c) 00000000 00000000  
[211700.085663] INFO: task kworker/36:0:1515 blocked for more than 120 seconds.
```

2. 根据Bus-Id找出对应的GPU卡编号,在跑测试的时候排除它,比如机器8张卡,device 2 故障,那个参数这样写:

```
export CUDA_VISIBLE_DEVICES=0,1,3,4,5,6,7 #2不写在里面  
./gpu_burn 100
```

3. 跑完之后关机,找出那张没有温度的卡,即故障卡