```
sort.c
```
| gcc −O3 −g sort.c −o sort.exe
↓

```
sort.exe
```
5910 ms

| perf record −e cs_etm/@20070000.etr/u −−per−thread ./sort.exe
↓

```
perf.data
```
contains ETM execution traces

| perf inject −i perf.data −o inject.data −−itrace   compile ETM to LBR
↓

```
inject.data
```
contains LBR events

| create_gcov −−binary=sort.exe −−profile=inject.data −−gcov=sort.gcov
↓

```
sort.gcov
```

| gcc −O3 −fauto−profile=sort.gcov sort.c −o sort−autofdo.exe
↓

```
sort−autofdo.exe
```
5806 ms