BRAIN STORMING ON BUSTING TROUBLES
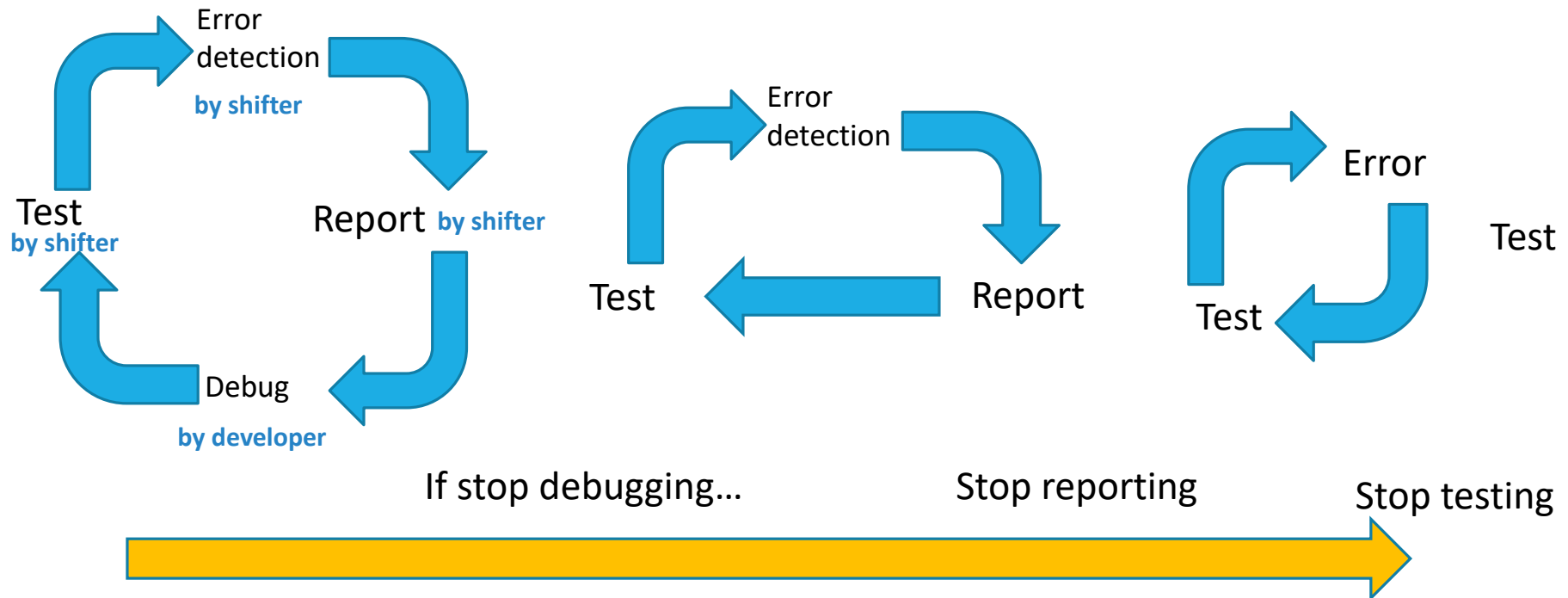
➤ DAQ stability can be estimated by "Live time/Total beam time"

Improve DAQ efficiency

Reducing # of troubles

Reducing recovery time

priority

manpower

So, the priority of fixing a subsystem's DAQ and man-power assignment etc. can be assessed by "DAQ efficiency" or "length of downtime".

Each expert's talk

"Error diagnosis system"
"Toward Non-Stop DAQ operation" etc.
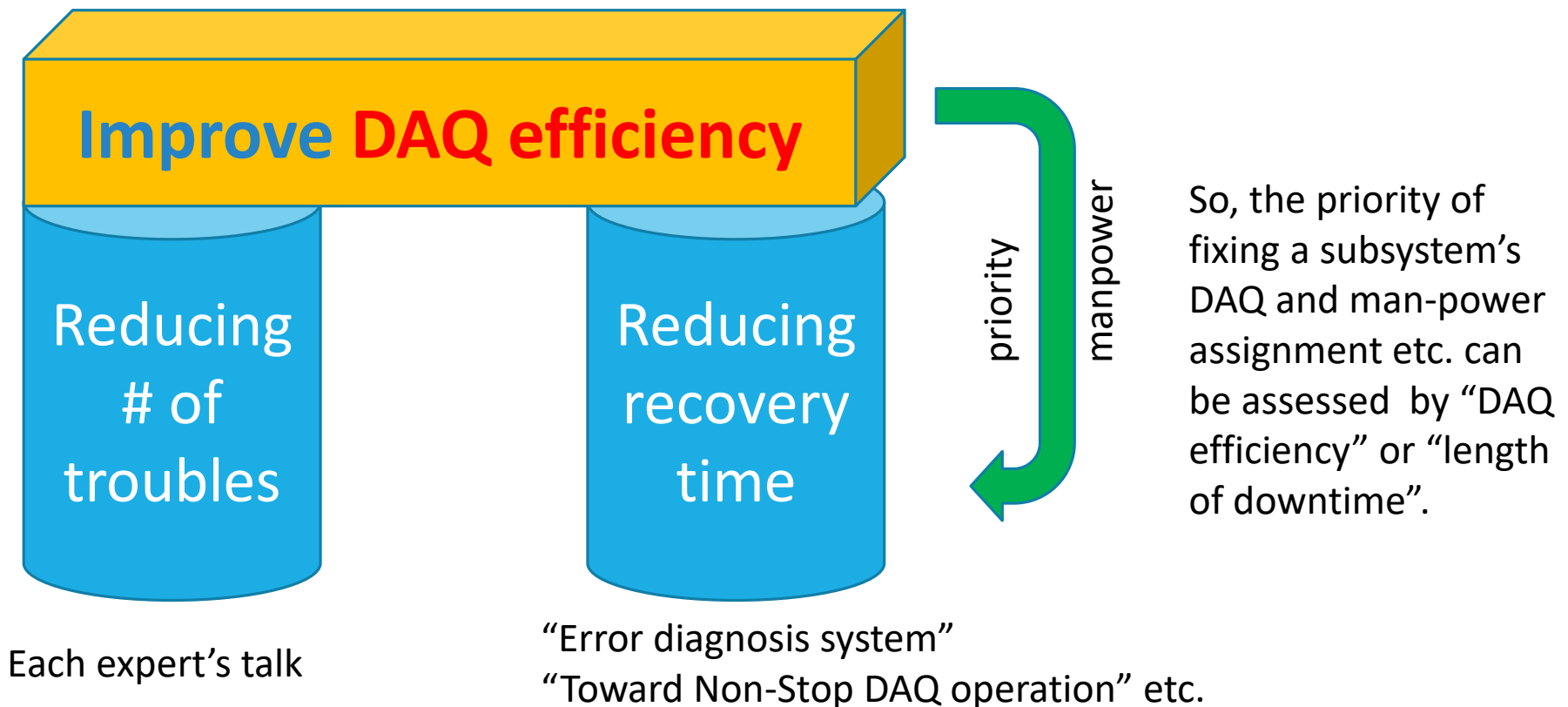
Discussion before phase III

➢ We need to keep the cycle of debugging during DAQ test/ beam run

Error detection

by shifter

Test
by shifter

Report **by shifter**

Debug

by developer

Error detection

Test

Report

Error

Test

Test

If stop debugging…

Stop reporting

Stop testing

➢ The circle tend to shrink.

During phase 3
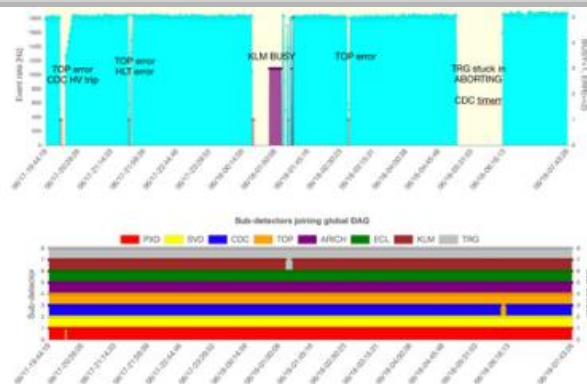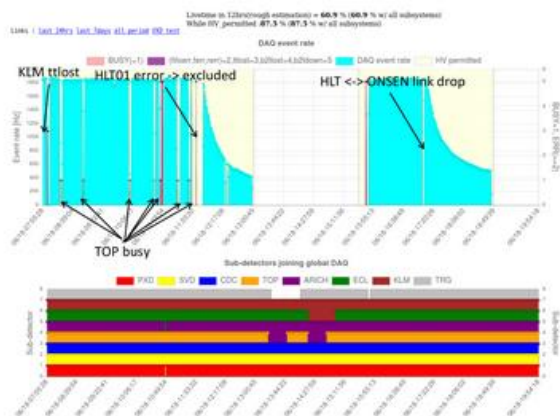
- ➢ DAQ expert shifters report the downtime and reason.
- ➢ Those plots has been useful to explain the current status.

MORE DETAILED INFORMATION

➢ The previous plots are not enough to know which part needs to be fixed/improved soon.
➢ It is better to have more detailed information
　➢ But currently it takes hours to make summary tables in a week like below…
　➢ Considering what is an easy way to do this kind of thing.

Ranking of
downtime this week
1.　sub-system A
2.　sub-system B
3.　..
4.　…

date	Downtime (min.)	Error(Sometimes, occurred due to other sub-system's trouble)
06/18-01:24:13	55.7	Cpr7001 froze
06/21-04:26:37	45.9	SLC daemon died on SVD ROPC
06/21-08:25:52	18.8	SLC daemon died on TOP COPPER
06/18-11:47:04	15.0	HLT error
06/21-19:08:25	13.5	HLT stuck
	12.8	Other minor troubles x3
	161.7	

ANY IDEAS ?

Improve **DAQ efficiency**

Reducing # of troubles

Reducing recovery time

Monitor and feedbacks

Each expert's talk

"Error diagnosis system"
"Toward Non-Stop DAQ operation" etc.