

# OQI operational launch | 5 March 2024

## Workshop A2 Access for all - Summary

**Workshop timespan:** 13.15 – 14.45

**Location:** CERN, Science Gateway Auditorium C

**Zoom:** <https://cern.zoom.us/j/68448816762?pwd=NCluL2Z0aE5seEhZWkRVOVZmbDVnOT09/>

**Session chairs:** Enrica Porcari (CERN) and Marieke Hood (GESDA)

**Rapporteurs:** Ines Juvan Beaulieu (OQC) and Julia Thiele (AWS)

### Summary of workshops findings

- Our workshop focused on the OQI's role to **broaden access to quantum computers, thus making the technology more inclusive**
- The group was composed exclusively of the **industry providers** who have already committed to donate time on their quantum computers or on simulators, and some who are willing to partner in the same way in the future
- It was agreed that our **group of initial supporters is likely to be extended**, as OQI's offering needs to be representative of all technologies on the market, and more companies or research centers are making their computational capacity available through the Cloud
- The discussions focused on the **technicalities** of how industry providers will make their capacity available to OQI, for the implementation of the use cases but also possibly and selectively for its other activities incl. training end-users to optimize the utilization of computational resources.
- CERN reminded that **OQI-allocated resources are excluded from the scope of its current RFP about cloud services**
- Providers insisted that they need early **visibility on the OQI timeline** to effectively reserve simulation and QPUs capacity. The anticipated timeline was communicated as follows: need for QPUs in the summer for initial 2-3 use cases, then November for a selection of up to 3 use cases of the new pipeline to be initiated in April 2024 with a call for submissions.
- It was highlighted **the donated resources are very valuable and should be used in the most effective and impactful manner.**
- Other key take aways of the workshops are:
  - It was agreed that the scope of the **partnerships with OQI should not strictly be limited to device access**, we are ready to commit to support OQI also by bringing expertise on how to best use these devices, and to support the development of use cases
  - **Focus on SDGs** : a condition of success for OQI is its focus is on SDG-related applications (so that the collaborative work isn't impeded by commercial preoccupations)
  - **Openness and inclusivity**: it was agreed that several partners could work on the same use case either in a collaborative manner or in parallel

### Participants

12 attendees (industry spearheading partners, and candidate partners)

OQI team: CERN (Head of IT, QTI expert, procurement expert), GESDA (Marieke), OQI Advisory Board Member (Cornelius Hempel)



Photos of the workshop can be downloaded here: <http://cds.cern.ch/record/2890914>

### Next steps

We kindly ask all industry providers to communicate point of contact for the transfer of agreements (from GESDA to CERN). Our next meeting is planned to take place in April with the objective to discuss more detailed inputs on OQI's use cases pipeline. An invitation will be shared in due course.

## Detailed run of show

- 13.15 – 13.20     **Welcome to the workshop**  
*Enrica Porcari*
- 13.20 – 13.40     **Round of introduction**  
*All*
- 13.40 – 13.50     **Access for all through OQI – what have we achieved so far**  
*Marieke Hood*
- Mission and values of OQI and how they related to Access pillar
  - Lessons learned: technology agnostic, who can be part of the pool of computers and open questions: young market, no standards and relatively loose MoUs
  - What the resources are needed for: use case development & implementation and support & training
- 13.50 – 14.40     **Moderated discussion on practical engagement**  
*Enrica Porcari and Marieke Hood*
- Future of the agreements: commit to the “open” principle of OQI, expansion of the scope towards other types of “resources” incl. expertise/support, partnerships reassessed at end of 2024 based on effective cooperation  
*Enrica Porcari (5 min)*
  - Key milestones for 2024, timeline for the need of resources  
*Marieke Hood (5 min)*
  - Deep dive use cases (20 min)
    - Modalities to activate the agreements (industry submitting use cases vs. industry implementing use cases when simulators or QPUs needed) (bidding process vs. everyone who wants can be part it) (benchmarking)
    - Feedback on types of use cases (methods) adapted to which modalities, and for shorter-term implementation
  - Support & training to optimize utilization of QPUs and cross-over with educational pillar of OQI (10 min)
- 14.40 – 14.45     **Conclusions of the workshop and next steps**  
*Enrica Porcari*