

DRD1 Collaboration Chair vision statement- Anna Colaleo

Embracing the opportunity to serve as DRD1 Collaboration Board (CB) Chair, I envision an era of robust teamwork and innovation in our gaseous detector research. The DRD1 Collaboration with its emphasis on cutting-edge technologies and diverse detector concepts, holds immense potential to address challenges outlined in the ECFA R&D roadmap and promote new ideas, “blue-sky” research, and applications beyond fundamental physics.

Since the formation of the ECFA TF1 R&D detector roadmap, I have promoted a bottom-up process in outlining the main challenges and drivers for future R&D. I have actively sought feedback from institutions, comprehending their needs and evaluating suggestions to enhance opportunities for detector R&D. Institutions within RD51 have expressed a desire for the continuation of the RD51 program, while those outside RD51 have advocated for exporting the RD51 model to other detector technology domains. This underscores the widely embraced idea of the importance of sharing know-how, fostering synergy, and supporting “blue-sky” generic R&D to efficiently advance research and promote innovation in our field. This approach implies the establishment of a collaborative framework for discussion, sharing experiences, tools, and infrastructures to facilitate collaboration among different groups engaged in R&D for various detector types and applications.

In preparation for the DRD1 proposal, I have actively contributed to shaping the proposed scientific organization, with Working Groups (WGs) serving as the backbone of our collaborative efforts. I wholeheartedly endorse the development of Common Projects, particularly by fostering novel ideas from young researchers and the creation of Work Packages (WPs), dedicated not only to applications outlined in the ECFA roadmap but also to additional ones proposed by our community. I emphasize the importance of inclusivity as a fundamental aspect of this framework, enabling every group, including smaller ones, to contribute to R&D and enhancing the involvement of diverse groups in advancing detector technology.

Some specific thoughts on DRD1 CB in the next two years:

- **Community-Driven Collaboration:** I am committed to fostering a community-driven collaboration, encouraging active participation from each institution based on its unique capabilities to ensure the success of R&D projects. Recognizing the significance of shared knowledge and synergies, I aim to establish a vital forum that enhances communication and cooperation among researchers, institutes, and funding agencies. Our global network will serve as a hub for ideas, providing access to top-notch facilities, and engineering support, and strengthening our ties across continents. This environment will actively support the development of necessary tools such as simulation and electronics, fostering the infrastructure required for R&D on novel detectors. The goal is to validate their performances against the demanding specifications of future facilities and applications.
- **Global Network and Access to Facilities:** Utilizing the extensive international network of the DRD1 collaboration, we can aim to streamline access to testing facilities and advanced engineering support. This initiative will strengthen collaborative ties between DRD1 research laboratories and

institutes, promoting a global approach to detector development.

- **Support to different R&D projects:** R&D projects often run concurrently with ongoing, fully funded experiments. It is crucial to recognize that, for R&D to succeed, a 'critical mass' of resources, skills, and participants is necessary. Within the framework of the WP activities, the contribution of participating institutes and their internal definition of goals, milestones, and deliverables are crucial in achieving WP R&D objectives. Comprehensive support, including support through WG activities, is essential, and I pledge to provide it without external interference that may compromise research independence. Simultaneously, the freedom to explore new ideas and pursue blue-sky projects should be preserved. Engaging in R&D inherently involves a certain percentage of failures, but it is through these setbacks that we can learn, adapt, and progress. I believe in fostering a culture where project failures are seen as opportunities for new ideas and innovative solutions. As the Chair of the DRD1 CB, I commit to safeguarding this freedom and providing an environment where the research community can operate without undue restrictions.

- **Decision-Making Process:** The CB is the highest decision-making body in the DRD1 organization and must approve all significant decisions. It does not have an executive role but serves as a consensus-building entity. I am committed to ensuring a well-defined decision-making process characterized by clear approval steps and decisions reached through extensive consultation and open discussion. Consensus is crucial to act with a coherent voice and better protect DRD1 interests. While it is important to be open-minded and proactive in embracing new ideas that offer opportunities for improvement, it is also important to safeguard the autonomy of the DRD1 Collaboration. Ensuring independence in decision-making and adhering to agreed-upon plans are crucial. I will monitor progress and protect DRD1 CB choices.

- **Transparent Communication:** Adequate and transparent communication within the CB is paramount. This includes circulating meeting agendas well in advance, facilitating efficient formal endorsements, and providing written documentation with prompt minutes for quick dissemination of decisions. I will implement a structured information flow to streamline communication processes. Wide consultations within the Collaboration will be a priority, bringing any pertinent issues to its attention.

- **Inclusivity and Diversity:** I believe one of the most important strengths of the DRD1 Collaboration lies in the diversity of technologies, research fields, and regional characteristics. I will advocate DRD1 management impartiality, open-mindedness, and fairness, fostering a collaborative culture that values diversity and inclusivity. Every institution, technology, and project within the Collaboration will have an equal opportunity to contribute and thrive. Increasing visibility and recognition of institutional contributions, guaranteeing a fair share of coordination responsibilities, and involving both big and small groups equally in the decision-making process are essential aspects of my role. As DRD1 CB Chair, I look forward to engaging with CB members to understand their issues and situations.

- **Efficient Management Bodies and Scientific Committee Operations:** Recognizing the significance of the work carried out by the DRD1 scientific and management bodies, I will ensure their

efficient operation. This involves supporting their functions to address specific aspects of collaboration activities and ensuring flexibility to address institute-specific challenges. If requested, I will provide support to the DRD1 management and CB members in negotiations with funding agencies, ensuring final funding agreements align with the collaboration's objectives.

- **Support for Young R&D Experts:** Integral to my vision is providing recognition and support for young R&D experts. I will consistently promote students and young colleagues in various roles, spanning different geographical regions and managerial positions. I acknowledge the responsibility to motivate and support the younger generation within the collaboration, facilitating their career development through opportunities, visibility, and transparency in appointment processes.
- **Strengthening Collaboration and Increasing Research Potential:** Official procedures for seeking new institutions and support for newcomers will strengthen the DRD1 Collaboration. Efficient pooling of resources through joint projects (either Common Projects or Work packages) is crucial. I will advocate for research plans that attract long-term funding, enabling the community to effectively address future technical challenges and build strong relationships between institutes and possibly industrial partners. This approach aims to increase research potential while reducing costs.
- **Collaboration and Synergy:** Collaboration with other DRDs can yield mutual benefits. As the prospective DRD1 CB Chair, I will actively foster contributions from diverse communities, encouraging synergy and collaborative studies, especially among younger colleagues. It is crucial to ensure that the DRD1 Collaboration remains attractive to groups from adjacent fields, such as nuclear physics, astrophysics, social applications, and small-scale "blue-sky" generic R&D projects. This presents an excellent opportunity for knowledge exchange and career development.

In conclusion, my goal is to ensure fairness, transparency, and equal opportunities within the DRD1 Collaboration. I am committed to fostering an environment that encourages innovation and inclusivity.

Drawing on my experience in management roles in international collaborations and a fair understanding of the CERN environment, along with the capability to create a common unified collaboration while maintaining diversity, I am prepared to support this new community. If you honor me with the election as the DRD1 Collaboration Board Chair, I will ensure that every voice is heard, and every endeavor contributes to the advancement of our shared goals.

Thank you for considering me for this pivotal role.