

Training Course Participation Report

2022 Biomedical Innovation and Entrepreneurship Training course for SPARK Asia and Oceania
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Introduction: This program is an interactive platform for professionals to conceptualize innovative biomedical concepts for implementation as a medical product or service. In the SPARK workflow, participants are divided into groups during the biomedical entrepreneurial course to increase immersion and involvement in the process. The goal of the groups is to synthesize the idea and bring it to a formalized conceptualized idea with all the components (IP, PoC, go-to-market strategy, and so on). Engagement is also fueled by the fact that groups compete for two awards: the People's Choice Award and the Expert's Choice Award. The course culminates in final pitches for experts and all participants of the SPARK program.

Materials and course training: Starting from the first day, after a short introduction, the program consisted of intensive Zoom and Teams courses with one lunch break. In order to manage the comprehensive courses, the lecturers kept their lectures in a dialogue format with open questions, which allowed students to consistently study important content throughout the day. The program included lectures by world experts and professionals, the most relevant topics include product conceptualization, detailed schemes for medical device/service regulating, patenting and protecting of intellectual property (IP), and regulation strategies towards institutional government organizations such as FDA and PMDA. Additionally, it is worth noting that the lectures paid attention to human relations in business and team building, as well as communication aspects and creativity to think "outside the box" (e.g., 5 Whys method).

Workshop and obtained experience: My team consisted of a cardiovascular surgeon, a Ph.D. student in allergology, and a specialist in biomedical device development. Having a completely diverse background, we came up with the idea of new alternative solutions in aesthetic surgery and cosmetology compared to the current Q-laser technologies. Such lasers have low patient compliance, are painful, are expensive to use, have a number of long-term dermatological complications, and may not achieve the expected result. At every stage of conceptualizing the idea and preparing the presentation, we were consulted by Dr. Isabella Hajduk and Prof. Michael Wallach. The professor, in addition to his lectures, provided invaluable support and shared insights in the field of design thinking and other valuable knowledge. As a result of an exciting team effort, we were able to deliver a high-quality presentation and an interactive final pitch that led my team in winning the People's Choice Award.

Conclusion: In today's world, bio-entrepreneurship skills are indispensable and the zeitgeist calls for advanced healthcare. Definitely, this course is strongly recommended for graduate students as well as faculty members. On the one hand, the valuable knowledge of this course will expand the horizons for scientific research, on the other hand, it will help to focus the scientific potential to translate research insights into specific demanded products for patients.

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