SD ※弊会記入欄

Form B-2 (FY2022) Must be typed Date (日付)

<u>31/01/2023</u>(Date/Month/Year:日/月/年)

Activity Report -Science Dialogue Program-(サイエンス・ダイアログ事業 実施報告書)

- Fellow's name (講師氏名): <u>Dr. Jyoti Jaiswal</u> (ID No. P21367)

- Name and title of the lecture assistant (講義補助者の職・氏名) ______Dr. Kazuyoshi Tsuchiya, Professor, Department of Mechanical Engineering, Tokai University____

- Participating school (学校名): <u>Shizuoka Kita Junior Senior High School</u>

- Date (実施日時): <u>19/01/2023</u> (Date/Month/Year:日/月/年)

- Lecture title (講義題目): Introduction to Nanoscience and Nanotechnology

- Lecture format (講義形式):

- ◆□Onsite ・ 図Online (Please choose one.)(□対面 ・ □オンライン(どちらか選択ください。))
- ◆Lecture time(講義時間)_<u>85 min (分)</u>, Q&A time (質疑応答時間) _<u>25 min (分)</u>

◆Lecture style(ex.: used projector, conducted experiments)

(講義方法 (例:プロジェクター使用による講義、実験・実習の有無など))

Online Projector

- Lecture summary (講義概要): Please summarize your lecture within 200-500 words.

Our lecture on "Introduction to Nanoscience and Nanotechnology" covered the following topics:

- Definition of Nanoscience and Nanotechnology, which explore the study and application of materials and structures at the nanoscale (1-100 nm).
- Explanation of the unique properties of nanoscale materials due to the large surface areato-volume ratio, leading to their ability to be controlled and manipulated for specific applications.
- Overview of Nanotechnology applications in areas such as drug delivery, electronics, energy, materials science, wearable devices, nanosensors, etc.
- Discussion of potential risks and ethical considerations of nanoscale materials and applications.

The lecture highlighted the significant potential of Nanoscience and Nanotechnology to transform technology in many fields, but also emphasized the importance of studying the properties of these materials and considering their potential risks and implications.

◆Other noteworthy information (その他特筆すべき事項):

In my opinion, the lecture would have been more impactful for students if it had included handson demonstrations, which would have been possible in an in-person setting.

- Impressions and comments from the lecture assistant (講義補助者の方から、本事業に対する意見・ 感想等がありましたら、お願いいたします。): The lecture by Dr. Jyoti Jaiswal was highly educational and enlightening. The presentation was clear and well-structured, with the use of visual aids and practical examples greatly improving comprehension. All in all, it was an excellent lecture delivered by Dr. Jaiswal.