

Form B-2  
(FY2022)  
Must be typed

Date (日付)  
30/1/2023 (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): Russell Neches (ID No. PE20736)

- Name and title of the lecture assistant (講義補助者の職・氏名)  
伴 広輝

- Participating school (学校名): 福井県立武生高等学校

- Date (実施日時): 27/1/2023 (Date/Month/Year: 日/月/年)

- Lecture title (講義題目):  
How science works : a new story, an old story

- Lecture format (講義形式):

◆ Onsite ・  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) 45 min (分), Q&A time (質疑応答時間) 45 min (分)

◆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))

Discussions in small groups guided by a worksheet, lecture with slides.

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

Science is a human enterprise. While the generation of scientific knowledge is undeniable, the process itself is not wholly understood or agreed upon. At the high school level, most students are familiar with the results of the scientific process, but may not appreciate the role that social interactions among scientists and between the scientific community and society play in the generation of new knowledge. To illustrate this point, I told two stories. The first story is from my own research, leading up to the unanswered question, "Where does the nucleus come from?" The second story was historical, outlining the rise of germ theory through the example of the 1853 cholera outbreak in London.

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

I prepared a handout asking the students to consider five questions chosen to encourage the students to think about epistemology -- how they know what they know. The students answered the questions individually, discussed them in small groups, and then formed their own questions which were directed to myself and to the classroom at large.

- 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。):