

1. Please describe the (b) (4) material used to construct the (b) (4) [REDACTED]
2. Please describe the shipping conditions used to transport the (b) (4) [REDACTED] vector from (b) (4) [REDACTED]. Please include details of how many (b) (4) [REDACTED] of vector will be in each shipment.
3. Please provide a rationale for why apheresis shipping validation studies were not performed using apheresis material from all (b) (4) [REDACTED] devices/collection kits
4. In your May 10 response to Comment #2 (Characterization for (b) (4) [REDACTED]) you indicated that this testing was exploratory and the test methods were not validated. Please provide more information on how these tests were performed, including a description of the Kite positive control and whether a dilution series was included to assess the limit of detection for (b) (4) [REDACTED].
5. Please provide a rationale for the selection of (b) (4) [REDACTED] lots ((b) (4) [REDACTED] healthy donors and (b) (4) [REDACTED] clinical subjects) used to calculate tolerance intervals for your process validation acceptance criteria.
6. With regard to the (b) (4) [REDACTED] plasmid, used to create the (b) (4) [REDACTED] [REDACTED] the Replication Competent Retrovirus (b) (4) [REDACTED] please indicate whether SOP-0524, *Incoming Release Testing of Quality Control (b) (4) [REDACTED] Reagents*, includes instructions for establishing a new lot of reference material prior to finishing the previously used lot.
7. When qualifying the (b) (4) [REDACTED] Working Cell Bank for use in the (b) (4) [REDACTED] assay, please indicate whether (b) (4) [REDACTED], measured at the beginning and end of the culturing period, using SOP TM-002-QC3, is assessed with or without stimulation. Also, please provide rationale for the method and timing of the (b) (4) [REDACTED] assessment.
8. Regarding the (b) (4) [REDACTED] IL-2 used during manufacture of axicabtagene ciloleucel, please provide clarification on the following points:
 - a. Please confirm that the IL-2 used is the licensed clinical grade product.
 - b. In Table 2, Section 3.2.S.2.3: Control of Materials, the IL-2 is listed as being supplied by (b) (4) [REDACTED], however, the certificate of analysis (CoA) supplied is from (b) (4) [REDACTED]; please clarify this discrepancy.
9. Regarding the (b) (4) [REDACTED] [REDACTED]:

- a. On Page 43 of Section 2.3: Quality Overall Summary, you state that these reagents are obtained from (b) (4), however, in Table 2, Section 3.2.S.2.3: Control of Materials, they are listed as being supplied by (b) (4) and the CoA provided is from (b) (4); please clarify this discrepancy.
 - b. On Page 43 of Section 2.3: Quality Overall Summary, you state that the human serum albumin (HSA) used in these reagents originates from (b) (4) please indicate if this HSA is the licensed clinical grade product.
10. Regarding the (b) (4)
- a. On Page 43 of Section 2.3: Quality Overall Summary and in Table 2, Section 3.2.S.2.3: Control of Materials, you state that this reagent is obtained from (b) (4), however, the CoA provided is from (b) (4); please clarify this discrepancy.
 - b. Please indicate whether the HSA used in this reagent originates from (b) (4) and if so whether it is the licensed clinical grade product.
 - c. Please provide testing information for the (b) (4) used during the manufacture of the (b) (4) included in this reagent.
11. Please provide additional rationale for using (b) (4) clinical lots in order to determine the lot release specifications for CD19 CAR expression and (b) (4) instead of using only the lots from the ZUMA-1 trial as was done to set the specification for cell viability.
12. Please provide the data provided on Pages 20-25 of (b) (4) in Excel format.
13. On Page 7 of Section 3.2.P.5.6: Justification of Specification, you request an exemption from the requirements for preserving final product retention samples. Please provide a more thorough rationale for requesting this exemption including the instances in which it would apply.
14. Regarding your (b) (4) approach for preserving final product retention samples:
- a. Please clarify the timing of sampling, formulation and handling of the quality control back-up samples (b) (4) samples).
 - b. Please indicate the complete formulation of the (b) (4) samples.
15. Please provide a rationale for not including cellular impurities, T-cell phenotype and T-cell composition as process parameters measured against a pre-determined PVAC in your PPQ study.