Kairos Power

KP-NRC-2404-005

April 11, 2024

Project No. 99902069

US Nuclear Regulatory Commission
ATTN: Document Control Desk
Washington, DC 20555-0001

Subject: Kairos Power LLC
Approved Version of Instrument Setpoint Methodology for the Kairos Power Fluoride Salt-Cooled High-Temperature Reactor

References:
1. Letter, Kairos Power LLC to Document Control Desk, "Instrument Setpoint Methodology for the Kairos Power Fluoride Salt-Cooled High-Temperature Reactor, Revision 1," October 4, 2023 (ML23277A314)
2. Letter, Nuclear Regulatory Commission, "Kairos Power LLC – Final Safety Evaluation of Topical Report, 'Instrument Setpoint Methodology for the Kairos Power Fluoride Salt-Cooled High-Temperature,' Revision 1," April 4, 2024 (ML24091A005)

This letter submits the approved version of the Kairos Power topical report titled "Instrument Setpoint Methodology for the Kairos Power Fluoride Salt-Cooled High-Temperature Reactor." On October 4, 2023, Kairos Power submitted Revision 1 (Reference 1) of the topical report. On April 4, 2024, the NRC provided the final safety evaluation for this topical report (Reference 2).

Enclosure 1 provides the approved version of the non-proprietary report.

If you have any questions or need any additional information, please contact Michael Ellett at ellettmic@kairospower.com or (704) 247-6310, or Darrell Gardner at gardner@kairospower.com or (704) 769-1226.

Sincerely,

Peter Hastings, PE
Vice President, Regulatory Affairs and Quality

Enclosure:

1) Approved Version of Instrument Setpoint Methodology for the Kairos Power Fluoride Salt-Cooled High-Temperature Reactor

xc (w/enclosure):

William Jessup, Chief, NRR Advanced Reactor Licensing Branch
Samuel Cuadrado de Jesus, Project Manager, NRR Advanced Reactor Licensing Branch
Matthew Hiser, Project Manager, NRR Advanced Reactor Licensing Branch
Michael Orenak, Project Manager, NRR Advanced Reactor Licensing Branch