Reviewer #1: The manuscript investigates how a teleoperator's movement patterns during UAV control can reveal information about their prior knowledge, cognitive load, and situational awareness during search and rescue operations.  
The following issues need to be considered:

1. The authors note that situational awareness showed only weak correlations with movement behaviors. Could the authors elaborate on whether these correlations might be stronger in high-stress environments compared to your controlled experimental setting?

Under stress, teleoperators could exhibit more pronounced movement patterns (e.g., faster speed or increased turn-rate) and heightened physiological responses, making SA-related cues more detectable. While the study focused on Level 1 SA (perception) in a virtual setting, high-stress conditions might also amplify higher-level SA (comprehension and projection), potentially improving the robustness of movement-based inferences.

1. Your research indicates that adaptive search based on movement cues outperforms random search but has lower success times than spiral search. What specific operational contexts might favor the adaptive approach despite this time difference?
2. The manuscript mentions that cognitive load measures showed unexpectedly weak correlations with movement. Have the authors considered whether the relationship might be non-linear or threshold-based rather than continuously correlated?
3. Your experimental design used a virtual replica of the Grand Canyon. How confident are the authors that the findings would generalize to different terrains with varying visibility conditions and topographical features?
4. Your study focused on UAVs in a wilderness search context. How might the movement-knowledge relationship differ for ground-based or aquatic robotic platforms?
5. What implications does your work have for operator training? Could movement patterns be deliberately trained to improve coordination with autonomous systems?
6. It would be beneficial to consider incorporating references to these attached papers in your current work, as they offer relevant methodologies for analyzing robot movement and fault detection in mechanical systems. The singular spectrum analysis approach for detecting oscillations in robot encoders and the synergistic method combining SSA with structured algorithms could provide valuable context for your teleoperator state inference framework, strengthening the technical foundation of your research.
   * A new synergy of singular spectrum analysis with a conscious algorithm to detect faults in industrial robotics." Neural Computing and Applications.
   * Detecting feeble position oscillations from rotary encoder signal in an industrial robot via singular spectrum analysis. IET Science, Measurement & Technology, 14(5), 600-609.

Reviewer #2: The concern of the paper is important, but the key novelties of the paper has not been properly presented and justified. Please consider the comments below to improve the paper further:

1. Key contributions of the paper should be expressed clearly and then the major findings of the paper should be provided.  
2. Please improve the equations by adding brief insights about them.  
3. Please specify the kind of uncertainties. They can be internal or external, parametric or non-parametric, constant, characteristic or random. Determining their structures and amounts are challenging in the real time applications.  
4. The critical review of the recent and related works are not quite strong. More recent works can be discussed in Introduction and the paper should be linked to literature of the topic addressed: Quantized Iterative Learning Control of Communication Constrained System with the Encoding and Decoding Mechanism, Transactions of the Institute of Measurement and Control; Repetitive process based indirect-type iterative learning control for batch processes with model uncertainty and input delay, Journal of Process Control; Dynamic Event-Triggered Consensus Control for Interval Type-2 Fuzzy Multi-Agent Systems, IEEE Transactions on Circuits and Systems I: Regular Papers; In this sense, also due to generality, it could be the object of a brief consideration focused on the advances on the topic and make relation with these papers, which have to be discussed in Introduction section in the context of a more comprehensive literature review.  
5. The manner of writing references should be harmonized and everything should be checked in detail. Namely, in many references are missing data, such as DOI numbers, pages, volumes and issues, or already entered data are incorrect.  
6. Performing a comparison-based analyses with a recent and related approach under the equal conditions could help to improve and justify the contribution of the paper.  
7. How the main control parameters will affect the control performance such as the control signal level, the control speed, the control consumption, etc. Please discuss this issue in appropriate places.