Subjective (S):  
  
Chief Complaint (CC): Traumatic brain injury due to a gunshot wound to the head.  
  
History of Present Illness (HPI):   
This report concerns a 24-year-old male, Patient M., who is participating in a virtual session with a focus on assessing his suitability for training with an assistive voice technology device, Speaker 7 (similar to Alexa). The encounter is part of a research initiative conducted by the University of Southern California. Patient M. incurred a traumatic brain injury on December 13, 2022, resulting from a gunshot wound to the head. Before the incident, he lived in Rancho Cucamonga, California, and previously resided in Fort Riley, Kansas. Prior to the injury, he was engaged in work related to aircraft maintenance, specifically on Blackhawk helicopters in the military, coded as MOS 15 Tango. After his military service, he transitioned to stone masonry and had recently started working at Spirit Aero Systems in aircraft maintenance before the injury occurred. Patient M. expressed no questions about the training and seemed to understand its purpose as using voice commands to obtain information when his caregiver is not present.  
  
History:  
- Medical History: Traumatic brain injury resulting in cognitive and communication deficits.  
- Surgical History: Not mentioned.  
- Family History: Not documented as pertinent.  
- Social History: Patient M. was working as a stone mason and in an aerospace occupation targeting aircraft before his injury. His family, particularly his caregiver, appears actively involved in his day-to-day activities and rehabilitation processes.  
  
Review of Systems (ROS):  
- General: Cognition and memory are being evaluated.  
- Neurologic: Previously sustained traumatic brain injury.  
- Mental Status: The session involved recall tasks, cognitive assessments related to temporal and spatial orientation, and problem-solving abilities.  
  
Current Medications, Allergies: None mentioned.  
Objective (O):  
  
Vital Signs:  
- Not recorded during the session.  
  
Physical Exam Findings:  
- No physical examination conducted during this virtual session.  
  
Laboratory Data:  
- None provided.  
  
Imaging Results:  
- None provided.  
  
Other Diagnostic Data:  
1. Cognitive Assessment:   
 - Orientation: Patient was able to state his age (24 yrs), but had some difficulties with temporal orientation (incorrectly identified the current year and month).  
 - Recall: Demonstrated the ability to recall provided words immediately.  
 - Sequential Memory: Accurately repeated number sequences presented by the clinician.  
 - Reasoning and Judgment: Demonstrated through task responses, e.g., correctly identifying which direction was needed, acknowledging the disappearance of objects when prompted with a scenario.  
 - Verbal Expression: Able to verbalize an understanding of how to use assistive technology for task completion, such as using voice commands to obtain information.  
  
2. Assistive Technology Usage Assessment:  
 - Demonstrated understanding of using voice-activated technology (Speaker 7) for various tasks, such as setting alarms, finding recipes, and obtaining reminders.  
 - Independently rated his ability to use technology for scheduling, medical and self-care needs, meal preparation, news and fact-checking tasks, and entertainment-related tasks predominantly as a '2,' indicating full independence without assistance.  
  
Recognition and Review:  
- Evaluated by a research team, including a clinician and research assistants from the University of Southern California.  
- The patient’s caregiver was actively involved in assisting and elaborating on responses throughout the assessment.   
  
Documented involvement by clinicians included verbal prompts, task execution assessment, and validation of the patient’s ability to operate a voice-activated assistive device independently. No reported adverse events or complications during the session.  
Assessment and Plan (A/P):  
  
\*\*Problem 1: Traumatic Brain Injury (TBI)\*\*  
  
\*\*Assessment:\*\*  
Patient M. is a 24-year-old male with a history of traumatic brain injury resulting from a gunshot wound to the head on December 13, 2022. The TBI has resulted in cognitive communication deficits, which include challenges with temporal and spatial orientation, retrieval, and sequencing tasks as assessed in the session. Despite these challenges, the patient is quite cooperative and motivated, demonstrating considerable recall abilities and an understanding of utilizing assistive technology.  
  
\*\*Differential Diagnoses:\*\*  
1. Cognitive impairment secondary to TBI.  
2. Potential post-traumatic stress disorder (PTSD) linked to the nature of the injury.  
3. Potential depression or anxiety secondary to life-altering injury.  
  
\*\*Plan:\*\*  
  
\*Additional Testing and Consultation:\*  
  
1. Cognitive Rehabilitation Evaluation: A comprehensive neuropsychological evaluation to delineate detailed cognitive impairments and guide therapy.  
  
2. Psychological Assessment: Evaluation by a psychologist or psychiatrist to identify comorbid psychological conditions, such as PTSD or depression.  
  
\*Therapy Needed:\*  
1. Cognitive exercises to improve memory, orientation, and executive functioning.  
2. Consider initiation of cognitive behavioral therapy (CBT) if the psychologist determines PTSD, anxiety, or mood disorder components.  
  
\*Specialist Referral(s) or Consults:\*  
1. Referral to a neuropsychologist for comprehensive cognitive rehabilitation planning.  
2. Consider referral to a psychiatrist or psychologist for psychological evaluation.  
  
\*Assistive Technology:\*  
Patient M. is being assessed for the effectiveness of Speaker 7, a voice-activated device for supporting daily activities. Training sessions will focus on:  
- Independent use of the device for alarms, reminders, and schedules.  
- Utilizing the device for help with self-care, medical needs, and meal preparation.  
- Employing the device for fetching news, facts, and entertainment.  
  
The participant's ability to function independently with the device scored predominantly a '2,' suggesting high levels of independence within structured tasks.  
  
\*Patient Education and Counseling:\*  
1. Educate Patient M. and his caregiver about stepwise improvements and realistic expectations in cognitive rehabilitation.  
2. Provide counseling regarding the use of assistive technologies and their integration into daily routines for enhanced autonomy.  
  
\*Home Exercise Program:\*  
- Reinforce the use of Speaker 7 for setting alarms and reminders, task scheduling, and self-care guidance.  
- Encourage consistent practice of device commands at home for improved device literacy and autonomy.  
  
\*Follow-Up:\*  
- Schedule a follow-up session to review the progress with the device and refine rehabilitation techniques.  
- Ongoing monitoring of cognitive recovery and psychological adjustment with periodic reassessment of cognitive function and mental health status.  
  
This plan aims to leverage assistive technology in compensating for cognitive deficits while promoting recovery and independence for Patient M. through cognitive training and psychological support.