



Human Systems Integration Specialist

Position Detail

Reports To	Safety Assurance Lead	Group	OneSKY Australia
Classification	ASA 7B	Location	Melbourne
Reports – Direct Total	0		

Organisational Environment

Airservices is a government owned organisation providing safe, secure, efficient and environmentally responsible services to the aviation industry.

Each year we manage over four million aircraft movements carrying more than 156 million passengers, and provide air navigation services across 11 per cent of the world's airspace.

Airservices has two major operating centres in Melbourne and Brisbane and a corporate office in Canberra. We operate 29 air traffic towers at international and regional airports, and provide aviation rescue firefighting services at 26 Australian airports.

We are committed to continuing to improve our business by providing our customers with services they value, and embedding new ways of working and technology investments to further innovate and optimise.

Our current air traffic management system TAAATS is the backbone technology that supports us to be one of the world's safest Air Navigation Service Providers (ANSPs). TAAATS is approaching end-of-life, its technology is aging and unable to match the capability that new air traffic management solutions can offer. Similarly, Australia's military air traffic management system (ADATS) is also approaching end-of-life, so together with the Department of Defence we're working on a whole new concept. We are creating Australia's first harmonised civil and military air traffic management system (CMATS).

OneSKY Australia is a joint Airservices and Department of Defence program focused on aligning the needs of civil and military aviation to deliver CMATS as part of establishing a National Air Traffic Management capability. The OneSKY Program is also responsible for coordinating and infrastructure and technology that will interface with and support CMATS integration.

Primary Purpose of Position

As a **Human Systems Integration Specialist** you will provide specialist advice, guidance and support to the OneSKY project and change initiatives including acquisition, system design, system validation and organisational change, where human systems integration is a systems engineering strategy that enhances system performance by integrating technical functions of subsystems with the human work processes those technical functions need to support. Human Systems Integration addresses the design of technological support systems such as interfaces and decision aids through consideration of human factors and human performance characteristics.

The outcomes of this work enhance Airservices safety performance, reputation and standing in the Australian aviation industry and internationally amongst our Air Navigation Service Provider (ANSP) peers.

The Human Systems Integration Specialist is a 'change agent', continually working to enhance Airservices Australia's safety culture through direct communication and engagement.

Within the OneSKY Program the role must work inclusively and cooperatively with other peers within the Project and Safety and Assurance Function to achieve seamless integration of human systems consideration and their impact on safety input into projects.

A key output of the role is the identification and assessment of human factors risks and issues leading to timely and practical recommendations provided to the OneSKY Project.

Accountabilities and Responsibilities

Position Specific

1. Ensure appropriate human integration activities are identified, planned and undertaken within OneSKY:
 - Development and maintenance of the OneSKY Human Factors Plan(s)
 - Review of contractor Human systems integration documentation
 - Providing human factors input into update of capability definition documentation (such as CONOPs, and User Requirements)
 - Providing human integration input into system design, testing and validation
 - Identifying key human integration issues and benefits
 - Designing activities
 - Analysing data
 - Reporting results in a concise and timely manner
2. Provide accurate, timely and practical recommendations to accountable managers as required.
3. Provide direction on the appropriate integration of human factors/performance elements into system design and assurance.
4. Collaborate and integrate with OneSKY Safety Program
5. The provision of tactical human factors services, e.g:
 - Guidance and advice on suitability of activities
 - The day-to-day facilitation, analysis and reporting of activities
 - Development of Safety Assurance documentation
6. Adhere to Airservices Safety Management System Requirements
7. Work closely with the Airservices Safety and Assurance function to establish a OneSKY Human Factors Program

People

- Maintain an effective working relationship with other Airservices staff to ensure that there is effective coordination of all activities in support of organisational objectives
- Work collaboratively with Air Traffic Control professionals, project engineers and other relevant disciplines to deliver project human systems integration objectives

Compliance, Systems and Reporting

- Support the timely delivery of the ATM systems Safety Case(s)

Safety

- Work Collaboratively with Safety Assurance Lead to support the OneSKY Safety Program
- Adhere to the Airservices Safety Management System (SMS)
- Work closely with Safety and Assurance function to provide a Human Factors Program for OneSKY consistent with SMS requirements
- Demonstrate safety behaviours consistent with enterprise strategies

Key Performance Indicators

Efficient, Effective and Accountable

- The inclusion of human systems integration assessment principles, techniques and methodologies
- High level customer satisfaction from the internal customers
- Effective design, analysis and evaluation that leads to timely and practical recommendations which:
 - Address key safety issues relevant to the project / change initiative
 - Result in improvements in human elements interfacing with operational systems

Commercial

Services are delivered to customer expectations and meet customer needs.

Safety

- Compliance with safety, risk, environmental and any other standards

Key Relationships

- OneSKY Safety Assurance Lead
- OneSKY project personnel
- ATC Professionals
- Engineering Professionals
- Airservices - Safety and Assurance
- Civil Aviation Safety Authority

Skills, Competencies and Qualifications

Qualifications:

Essential:

- Tertiary qualifications in human factors, psychology, cognitive engineering, systems engineering or a related field.

Desirable:

- Post-graduate qualification in human factors, human performance, human error analysis, psychology, cognitive engineering, design for optimum human performance, or a related field.

Skills and Competencies

Essential:

- Significant (>5years) experience in the practical application of human factors/performance assessment techniques, particularly in evaluating change in highly complex socio-technical systems.
- Demonstrated knowledge and understanding of cognitive psychology and human factors principles.
- Highly effective and concise communication skills in written and verbal form.
- Demonstrated high level ability to work independently/autonomously across multiple projects, while working collaboratively as part of a small team.
- Knowledge and demonstrated practical application of Safety Management Systems to change management.
- Knowledge and demonstrated application of workplace safety practice in comparable environments to ATM

Desirable:

- Knowledge and demonstrated practical application of Safety Management Systems to change management.
- Knowledge of current and emerging air traffic management operational systems, technologies and procedures, and of aircraft operations generally, both in Australia and internationally.
- Experience and/or knowledge in requirements specification and analysis.
- Experience and/or knowledge in systems engineering.

Performance Standards and Behaviours

As a member of Airservices, you will consistently demonstrate performance standards and behaviours that meet our Code of Conduct. This includes:

- Treating everyone with dignity, respect and courtesy
- Acting with honesty and integrity
- Acting ethically and with care and diligence
- Complying with all Airservices' policies and procedures, and applicable Australian laws
- Disclosing and taking reasonable steps to avoid any actual, potential or perceived conflict of interest
- Behaving in a way that upholds our vision, mission and values, and promotes the good reputation of Airservices.