

## About MultiPlex.studio

AFWERX Multi-Domain Operations Challenge — MultiPlex.studio led a team of Subject Matter Experts and partner firms Technica and Basil Security in developing a submission for the AFWERX MDO Challenge. We were selected for the AFWERX Fusion MDO Showcase, July 23rd-24th in Las Vegas.

### Contents

Vision.....	3
Mission.....	3
R&D.....	4
1. Risk.....	4
2. Communications.....	4
Administrative Information.....	4

DEMONSTRATION ONLY

DEMONSTRATION ONLY

## MultiPlex.studio (MPS)

### Description:

MultiPlex.studio was formed to tackle the AFWERX MDO Challenge and is the partnership between several independents, Technica and Basil Security.

### Stakeholder(s):

#### Technica :

*Technica brings their SmartFog platform to the equation which will be used as the backbone of this proposal and ...*

#### Basil Security :

*Basil Security's Policy Enforcement Engine will be leveraged to distribute data according to a multi-level classification policy as well as acting as a broker for distributing encryption keys according to that policy.*

#### Jason Lind :

*Coalition*

#### Nick Chadwick :

*Ops*

#### Mitchell Maddox :

*Command*

### MultiPlex.studio Executive Team

### Vision

Secure, resilient, real-time communications

### Mission

To tackle the AFWERX Multi-Domain Operations Challenge

DEMONSTRATION ONLY

## R&D

### *Perform research and development*

Formed to tackle the AFWERX Multi-Domain Operations Challenge we are now performing Independent Research and Development in the areas of Operational Risk Management and Secure, Resilient and Real-Time Communications.

#### 1. Risk

*Develop the use cases and architecture for Dynamic Operational Risk Assessment*

Dynamic Operational Risk Assessment — This requirement began as SBIR AF192-057 "Dynamic, Risk-Based, Situational Awareness and Response" and while we attracted intense interest from several Subject Matter Experts we ultimately concluded that the SBIR mechanism did not provide enough funding for all our contributors and partners. We are now developing the use cases and architecture independently with the intention of identifying government and civilian customers to fund the development effort.

#### 2. Communications

*Develop the architecture for a blockchain authentication mechanism to achieve secure, resilient and real-time communications*

During our analysis of the AFWERX project we discussed introducing blockchain as an authentication mechanism to achieve Secure, Resilient and Real-Time Communications however discovered the domain was not mature enough to include that in the proposal. We have started a working group to develop the architecture for such a product.

##### **Stakeholder(s):**

**Secure, Resilient & Real-Time  
Communications Working Group**

### Administrative Information

**Start Date:**

**End Date:**

**Publication Date:** 2020-12-09

**Source:** <http://multiplex.studio/>

#### **Submitter:**

**Given Name:** Owen

**Surname:** Ambur

**Email:** [Owen.Ambur@verizon.net](mailto:Owen.Ambur@verizon.net)

**Phone:**