United States Army
Cyber Center of Excellence
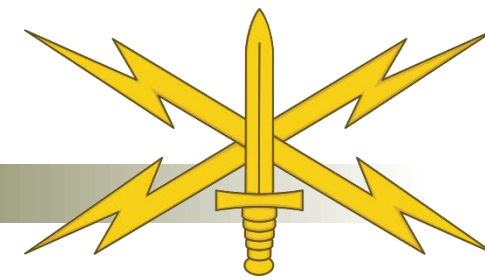
U.S. Army Cyber School Update

AFCEA TechNet
17 August 2021

Agenda

- Mission/Vision

- Strategic Plan

- Cyber Corps At-a-Glance

- Acquiring Talent

- Throughput

- Transforming Electromagnetic Warfare Curriculum

- Cyber and Electromagnetic Warfare Training Strategy (CEWTS)

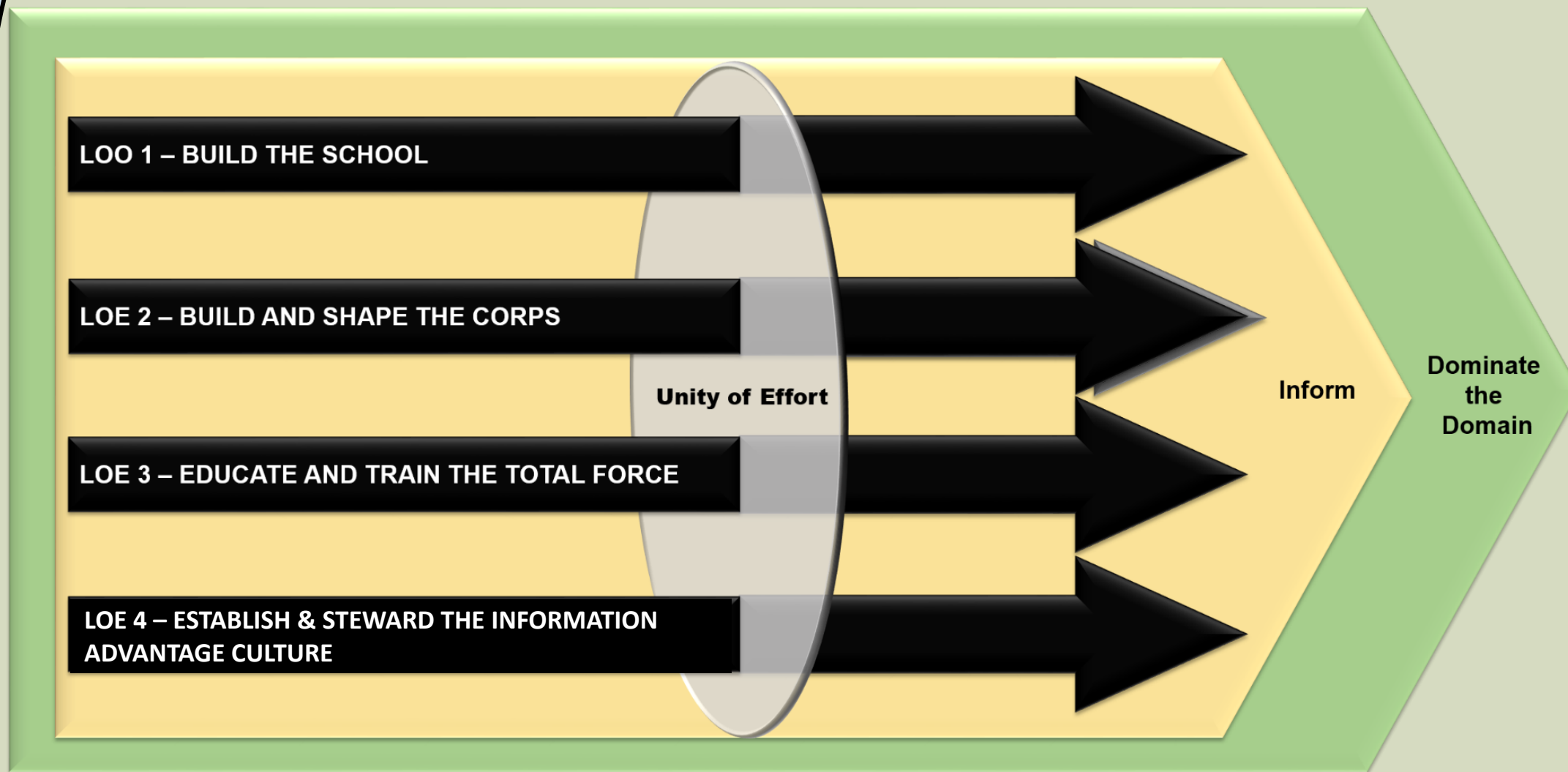- Employ of the Corps

U.S. Army Cyber School

Mission:

The Cyber School *acquires* America's most talented and innovative citizens and *develops* them into the world's most lethal, professional, ethical, and technically competent Cyber Warfare and Electronic Warfare workforces.

Vision:

To become the *world's leading organization* in educating, training, and developing DoD's Cyber Warfare and Electronic Warfare forces of choice through focused and purposeful career paths and academic programs with four core strengths: *intellectual curiosity, operational competency, mental agility, and persistent collaboration*.

USACyS Priorities

LOO 1 – BUILD THE SCHOOL

LOE 2 – BUILD AND SHAPE THE CORPS

Unity of Effort

LOE 3 – EDUCATE AND TRAIN THE TOTAL FORCE

LOE 4 – ESTABLISH & STEWARD THE INFORMATION ADVANTAGE CULTURE

Inform

Dominate the Domain

END STATE

A fully matured school manned and equipped to accomplish its training and branch proponent missions

A unified team that delivers integrated DOTMLPF-P solutions to the operating force

An informed, cohesive Cyber Corps that speaks with one voice

Deliver A Skilled Workforce

Drive Integrated Capabilities

Transform the CCoE & Fort Gordon

Steward the Profession

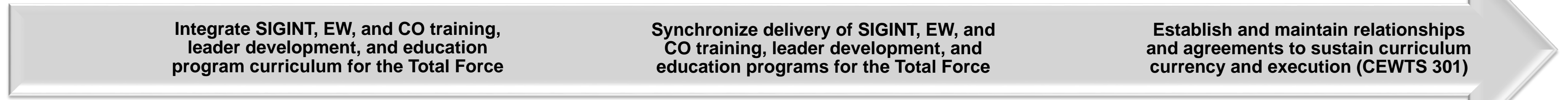Develop Leaders

Drive Change

4

Cyber School Priorities

LOO 1 – BUILD THE SCHOOL

Program facilities and funding for sustained operations (FOC)

Optimize manning to meet mission requirements

Establish relationships and agreements to sustain the School

LOE 2 – BUILD AND SHAPE THE CORPS

Drive & synchronize DOTMLPF-P capabilities

Mature accessions, career paths, talent management processes and programs, and leader development

Develop mentally, morally, and physically prepared Soldiers (CEWTS 101 & 201)

LOE 3 – EDUCATE & TRAIN THE TOTAL FORCE

Integrate SIGINT, EW, and CO training, leader development, and education program curriculum for the Total Force

Synchronize delivery of SIGINT, EW, and CO training, leader development, and education programs for the Total Force

Establish and maintain relationships and agreements to sustain curriculum currency and execution (CEWTS 301)

LOE 4 – ESTABLISH & STEWARD THE INFORMATION ADVANTAGE CULTURE

Establish, maintain, and improve strategic messaging

Foster cohesion and excellence across the Corps

Develop Cyber Corps Leaders

Cyber Corps At-a-Glance

History
(abbreviated)

- **Newest Branch in the Army**
- **Cyber Branch Established –** *1 Sep 2014*
- **Direct Commissioning Authorized –** *27 Oct 2018*
- **Electromagnetic Warfare Integrated into the Branch –** *1 Oct 2018*

Size of the Force
(in total authorizations – FY21)

CP71: 456

Active Component
Officers: *863*
Warrant Officers: *393*
Enlisted Soldiers: *1,872*

Army National Guard
Officers: *283*
Warrant Officers: *277*
Enlisted Soldiers: *835*

Army Reserve
Officers: *124*
Warrant Officers: *114*
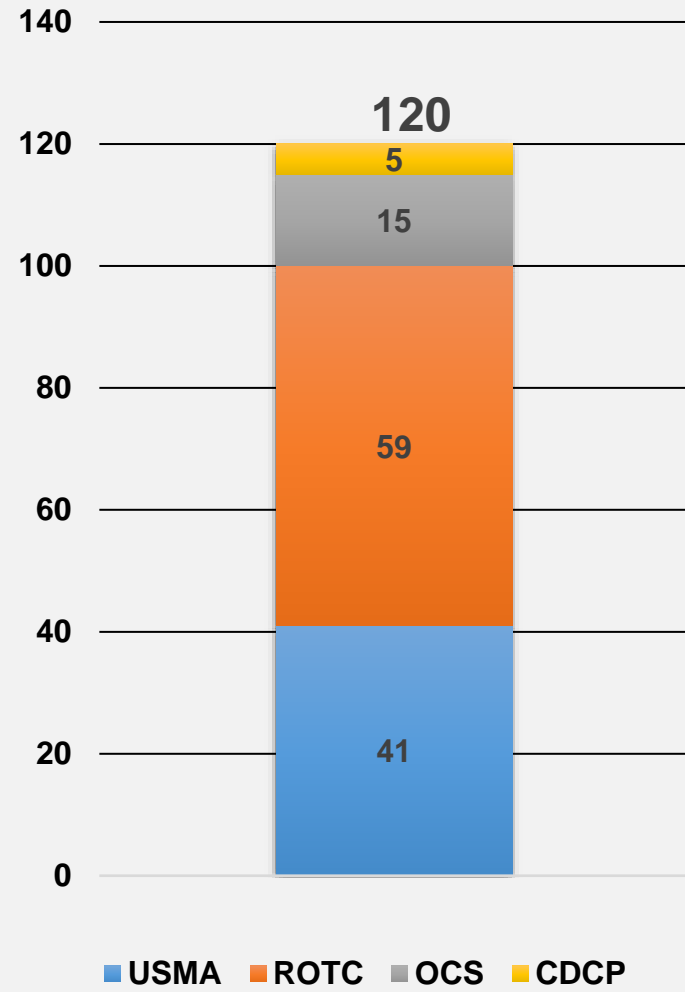Enlisted Soldiers: 237

Total Force: 4,998 (Military)

Acquire – Develop – Employ

Acquiring Talent in FY21

Officer

- 140
- 120 — **120**
  - 5
  - 15
  - 59
  - 41
- 100
- 80
- 60
- 40
- 20
- 0

Legend: ■ USMA ■ ROTC ■ OCS ■ CDCP

Warrant Officer

- 45
- 42
- 40
- 35
- 30
- 28
- 25
- 20
- 14
- 15
- 10
- 5
- 0

Warrant Officers

Legend: ■ CY ■ EW

Enlisted

- 700
- 600 — **600**
  - 180
  - 420
- 500
- 400
- 300
- 200
- 100
- 0

Enlisted

Legend: ■ CY ■ EW

Highlights
- 23% have bachelor's degrees
- 37% score ≥ 93rd percentile of ASVAB
- JROTC initiatives with ASA M&RA and Univeristy of San Diego

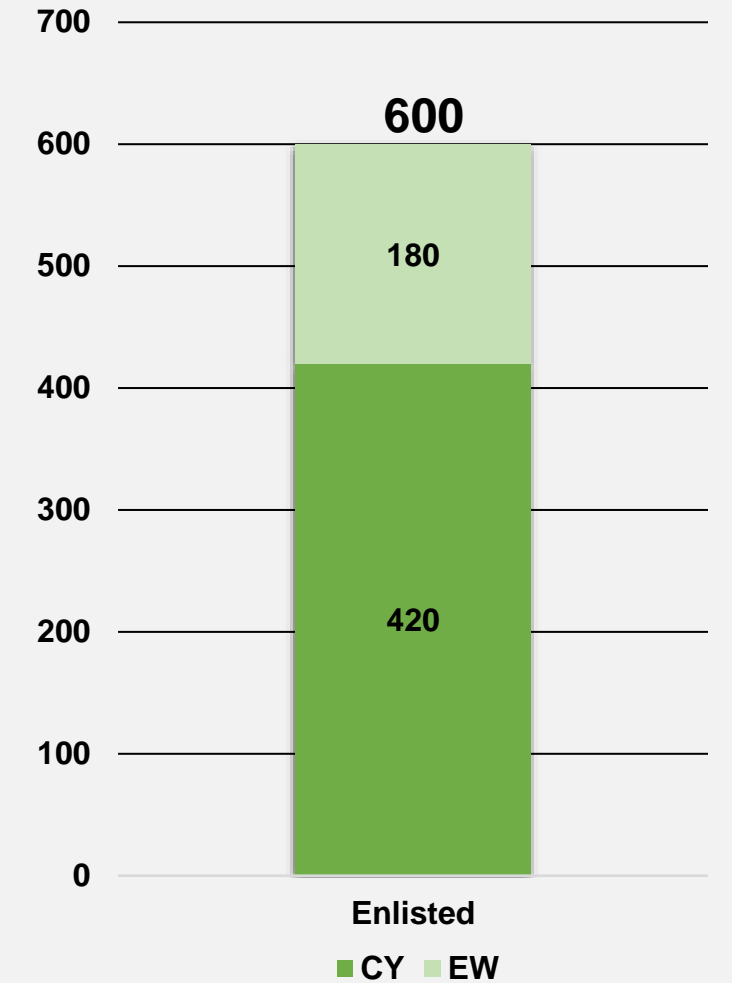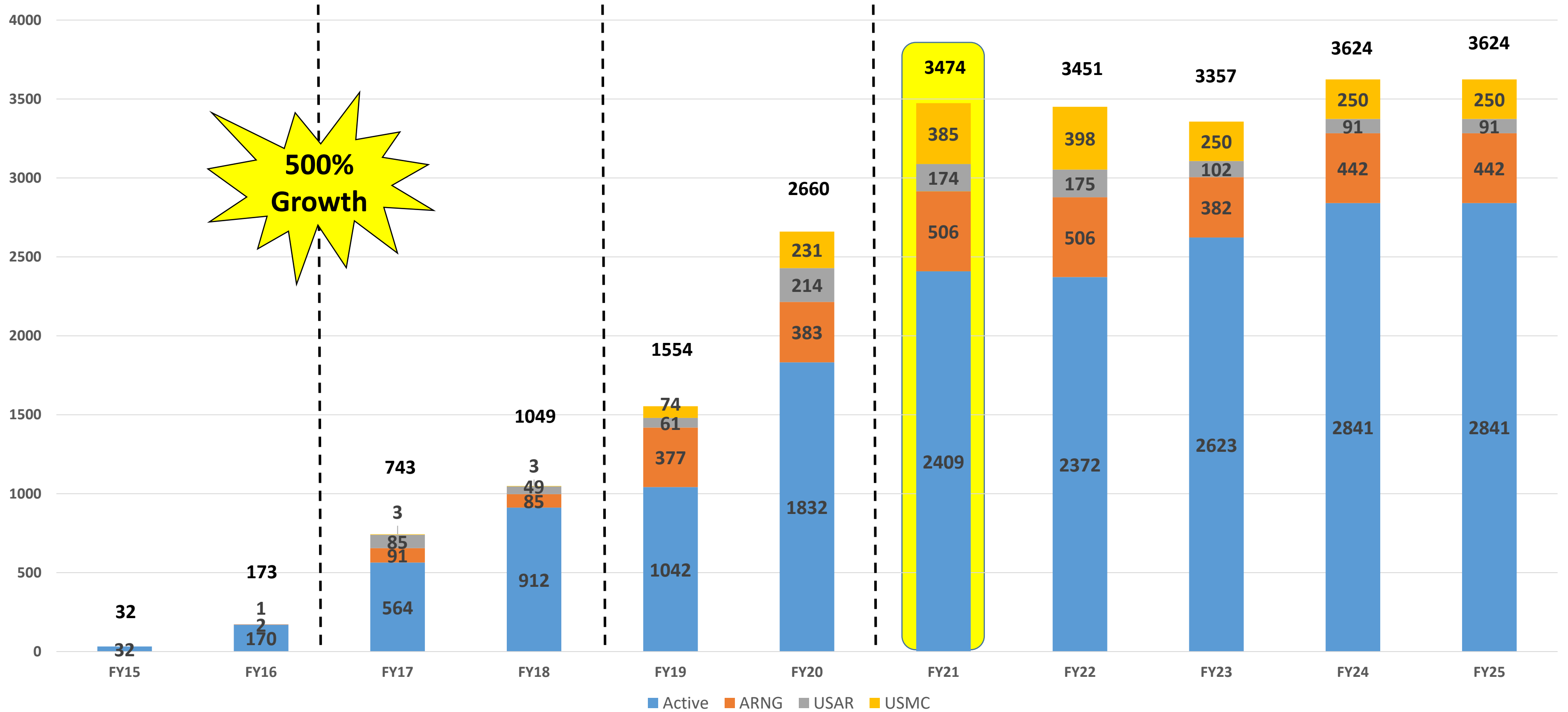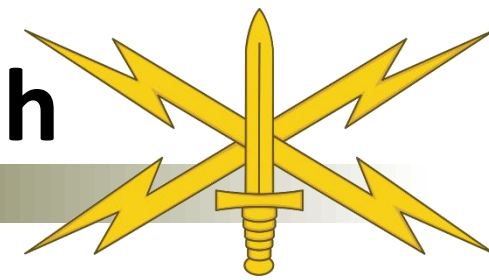**Highlights**
- Cyber Assessment and Selection Program - 17A/B/D
- Cyber Direct Commissioning up to COL/O-6
- Cyber ROTC Scholarships
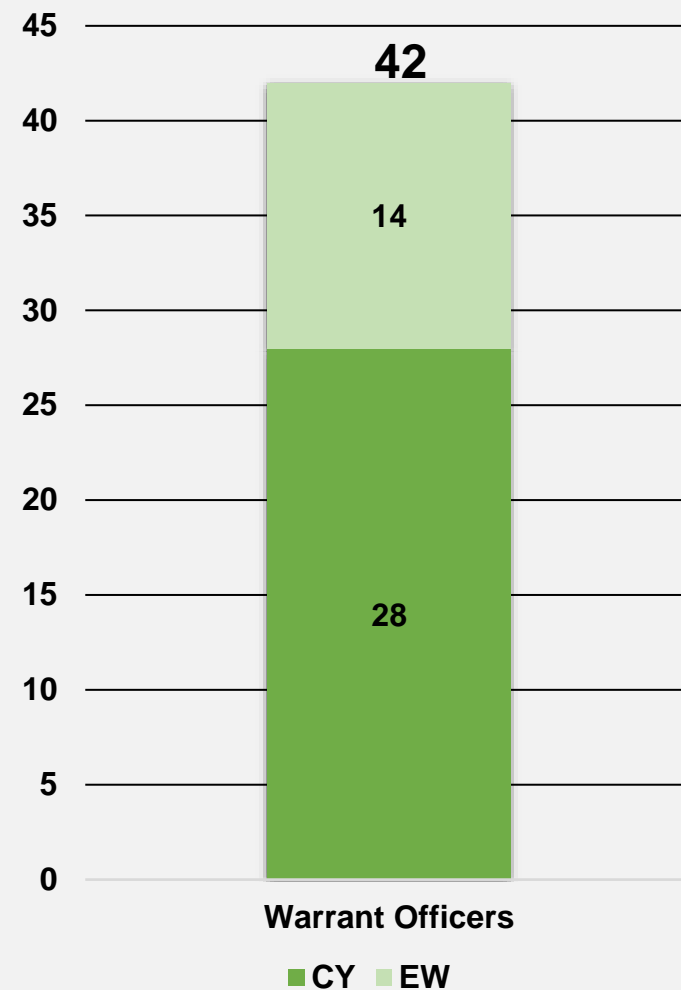
Highlights
- Aggressive inter-service recruiting
- Capabilities Development Technician
  - Street-to-seat accessions for 170D

Acquiring High-End Talent / Accessions Engagements Left of Commissioning and Enlistment

Proponent and School Foundation Built → Unprecedented growth

500% Growth

Chart data (stacked bars: Active, ARNG, USAR, USMC):

FY	Total	Active	ARNG	USAR	USMC
FY15	32	32			
FY16	173	170	2	1	
FY17	743	564	91	85	3
FY18	1049	912	85	49	3
FY19	1554	1042	377	61	74
FY20	2660	1832	383	214	231
FY21	3474	2409	506	174	385
FY22	3451	2372	506	175	398
FY23	3357	2623	382	102	250
FY24	3624	2841	442	91	250
FY25	3624	2841	442	91	250

Legend: ■ Active ■ ARNG ■ USAR ■ USMC

Doubling Student Load to Meet the Demands of the Operational Force
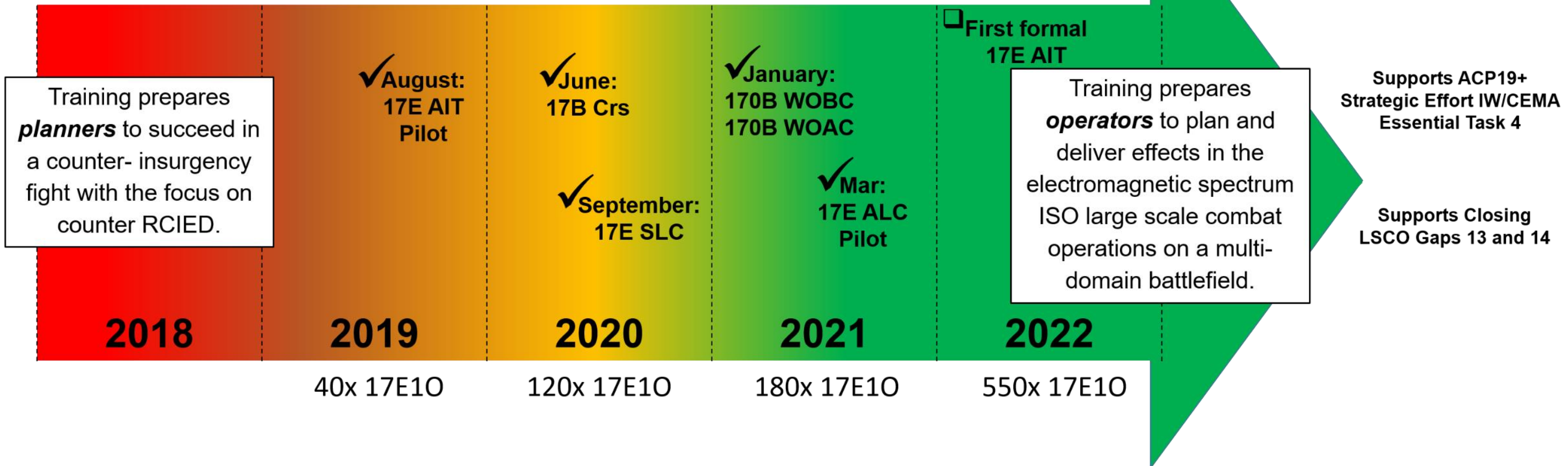
Rapidly Building the EW Workforce of the Future

EW Training at
Fort Sill, OK

EW Training is not just transitioning to Fort Gordon, it is being _transformed_ to meet the needs of LSGCO on the future MD battlefield.
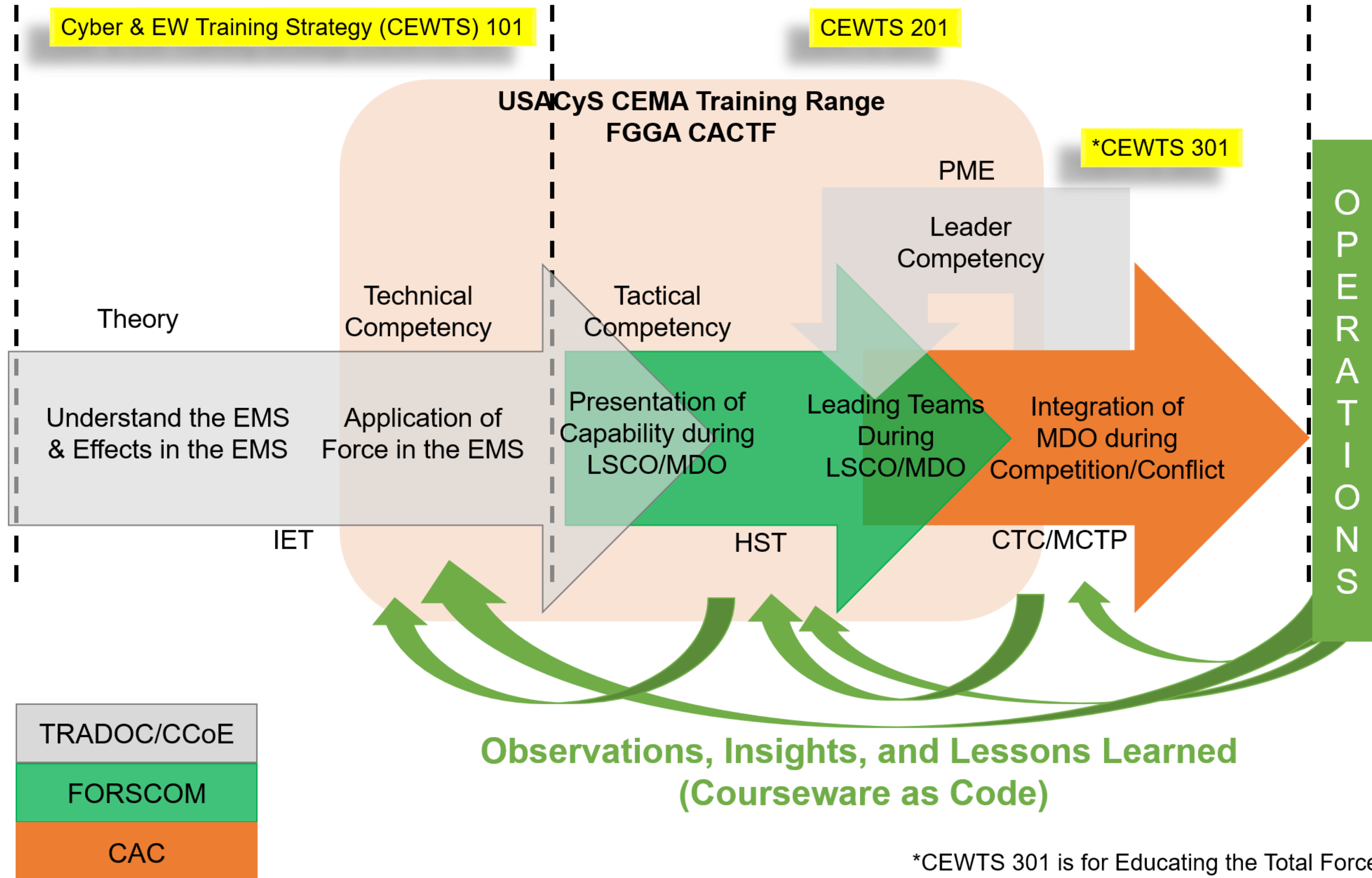
EW Training at
Fort Gordon, GA

Training Transformation Dates

Training prepares *planners* to succeed in a counter- insurgency fight with the focus on counter RCIED.

✓ August:
17E AIT
Pilot

✓ June:
17B Crs

✓ September:
17E SLC

✓ January:
170B WOBC
170B WOAC

✓ Mar:
17E ALC
Pilot

☐ First formal
17E AIT

Training prepares *operators* to plan and deliver effects in the electromagnetic spectrum ISO large scale combat operations on a multi-domain battlefield.

Supports ACP19+ Strategic Effort IW/CEMA Essential Task 4

Supports Closing LSCO Gaps 13 and 14

2018	2019	2020	2021	2022
	40x 17E1O	120x 17E1O	180x 17E1O	550x 17E1O

Acquire – **Develop** – Employ

EW Workforce Training: Institution to Home Station

Cyber & EW Training Strategy (CEWTS) 101

CEWTS 201

USACyS CEMA Training Range
FGGA CACTF

*CEWTS 301

PME

Leader Competency

Theory

Technical Competency

Tactical Competency

Understand the EMS & Effects in the EMS

Application of Force in the EMS

Presentation of Capability during LSCO/MDO

Leading Teams During LSCO/MDO

Integration of MDO during Competition/Conflict

OPERATIONS

IET

HST

CTC/MCTP

TRADOC/CCoE

FORSCOM

CAC

Observations, Insights, and Lessons Learned (Courseware as Code)

*CEWTS 301 is for Educating the Total Force

USACyS Cyber & EW Training (Current & Proposed Locations)

Adding Tactical Cyber Tasks to 17C10 AIT FTX

First Ever 17E10 AIT
- Two (2) initial classes began FY19
- Increased to six (6) classes in FY20
- Will average 500-800 personnel each year
- Increased training from 9 weeks to >28 weeks

Proposed: TA 36 / 37A / 42

Hours	Delivery
363	Instruction and Discussion
103	Practical Exercise
40	Software Defined Radio Lab
180	Basic Electronics Lab
88	EWPMT Lab
97	Radio Controlled IED Lab
150	CEMA Range

THEORY TECHNICAL TACTICAL
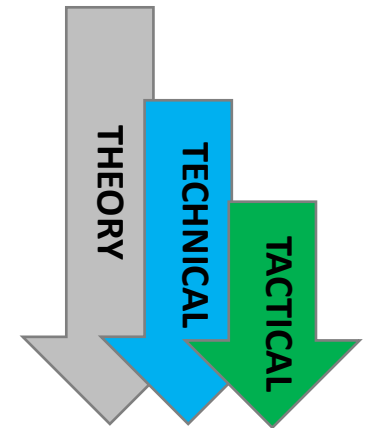
Current
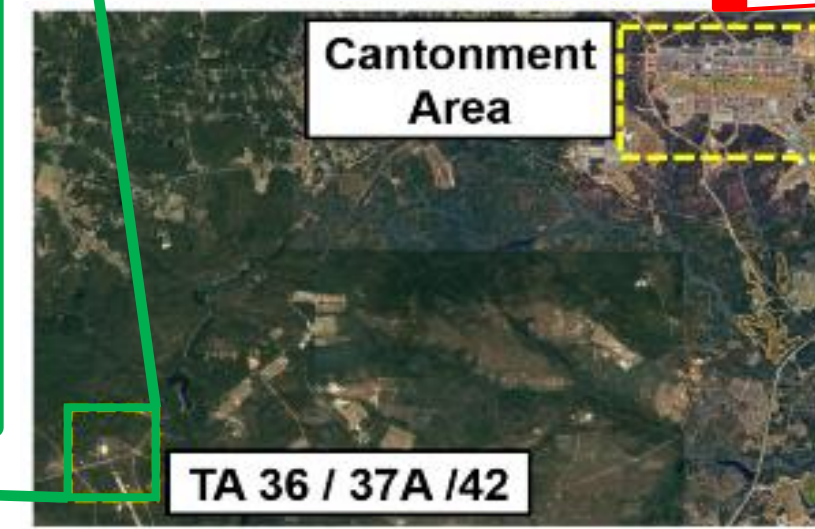
TA36/42

SSG Anthony Davis
CEMA Training
Range Complex

- All sites can be controlled by Main Town or Independently
- Functional Radio Station (1W)
- Network Integration from cantonment via Cyber School Training Network (CSTN)
- Incorporate multiple building materials (glass, wood, steel, rebar, shielded, concrete etc.)
- Functional transmitters on buildings- allows CADRE to change environment as needed
- Tunneling Network
- Near Peer GPS replication
- Integrated ICS/ SCADA
- Cellular Communications (2G, 3G, 4G, 5G)
- Wi-Fi & Bluetooth enabled infrastructure

Residential Town 2 Site 4

Small Town Site 3

Main Town Site 1

Residential Town 1 Site 2

SSG Jesse Williams
EW Range Operations and
STX Facility
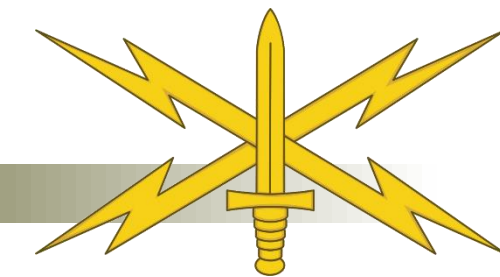
Tactical Vehicle Parking
Range Operations
Range Lab and AAR Facility
Male/ Female Bivouac
Aerated Latrines
Covered Mess and Training Shelters
EW Maintenance
Fixed Site EW Training
Bleacher Enclosures
Bus Drop Off and turn around
GOV/ POV Parking

TA 37A
FT Gordon
C130 Tactical
Air Strip
UAS/ CUAS

Need EW Firing Range as Part of Future MDO Range

Housing
Gordon Highway
Willard Training Area
EW Training

Cantonment Area

TA 36 / 37A /42

Forge and Project Power

Initial Military Training

Professional Military Education

Functional Courses

Strategic/Operational Forces

Officer

Basic Officer Leader Course — 17A 37wks / 17D 47wks

Cyber Operations Officer Course — 17A 26wks

Electronic Warfare Officer Qualification Course — 17B 13wks

Captains Career Course — 17A 22wks / 17D 22wks

Cyber Operations Planners Course

Offensive Cyber Operations Analyst

Cyber Common Technical Core

Title 10 Operator Course

Mission Cdr Course

Warrant Officer

Warrant Officer Basic Course — 170A 19wks / 170B 28wks / 170D 72wks

Warrant Officer Advanced Course — 170A 16wks / 170B 12wks / 170D 19wks

Enlisted

Advanced Individual Training — 17C 36wks / 17E 28wks

Advanced Leader Course — 17C 3wks / 17E 19wks

Senior Leader Course — 17C 3wks / 17E 8wks

Tactical Forces

Unique Forces

-Multi-Domain Task Force
-Information Warfare Task Force

Legend
Cyberspace Operations
Electronic Warfare

Providing Trained & Ready Cyber Forces

Acquire – Develop – Employ

Modernizing Cyber Corps Formations for MDO

ARCYBER formations

JFHQ-C

**CCMD
CO-IPE**

Strategic

Operational

780th MI
CMT/NMT/NST/CST

**1st IO Cmd
FST**

CPB

Service CPTs/CCMD CPTs/DODIN CPTs/National CPTs

**FORSCOM
formations**

ASCC CEMA Section

MDTF/I2CEWS

Corps CEMA Section

915th CWB
ECTs

Tactical

Division CEMA Section

**IEW BN
EW CO
2x EW PLT**

**USASOC
formations**

**SMU
SOF
Rangers**

**BCT CEMA Section
CAB CEMA Section**

**EW PLT
EW PLT**

Acronyms	
CO-IPE	Cyberspace Operations Integrated Planning Element
CPB	Cyber Protection Brigade
CPT	Cyber Protection Team
CMT	Combat Mission Team
CST	Cyber Support Team
CWB	Cyber Warfare Battalion
ECT	Expeditionary Cyber Team
FST	Field Support Team
I2CEWS	Intelligence, Information Operations, Cyber, Electronic Warfare, and Space
IEW	Intelligence and Electronic Warfare
IO	Information Operations
JFHQ-C	Joint Force Headquarters-Cyber
MDTF	Multi-Domain Task Force
NMT	National Mission Team
NST	National Support Team

Discussion / Q&A