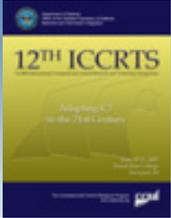


# NATO C2 Focused Experimentation



A Presentation to the 12<sup>th</sup> International  
Command and Control Research and  
Technology Symposium (ICCRTS)

**Brigadier General Ernst Otto Berk**

Deputy Assistant Chief of Staff,

Joint Experimentation, Exercises, & Assessment (JEEA)

**ALLIED  
COMMAND  
TRANSFORMATION**

**A new day ahead. A new way ahead.**



# The Catalyst

## New Threats

- 9/11
- Military operations in Afghanistan - ISAF

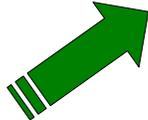


# NATO After Prague – Transform!

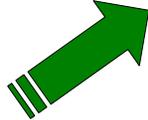


## Potential Riga Issues:

- Initiatives:**
- Prague Capability Commitments
  - NRF
  - Creation of ACT
  - Defense Against Terror initiatives
  - Comprehensive Political Guidance
  - Ministerial Guidance 06

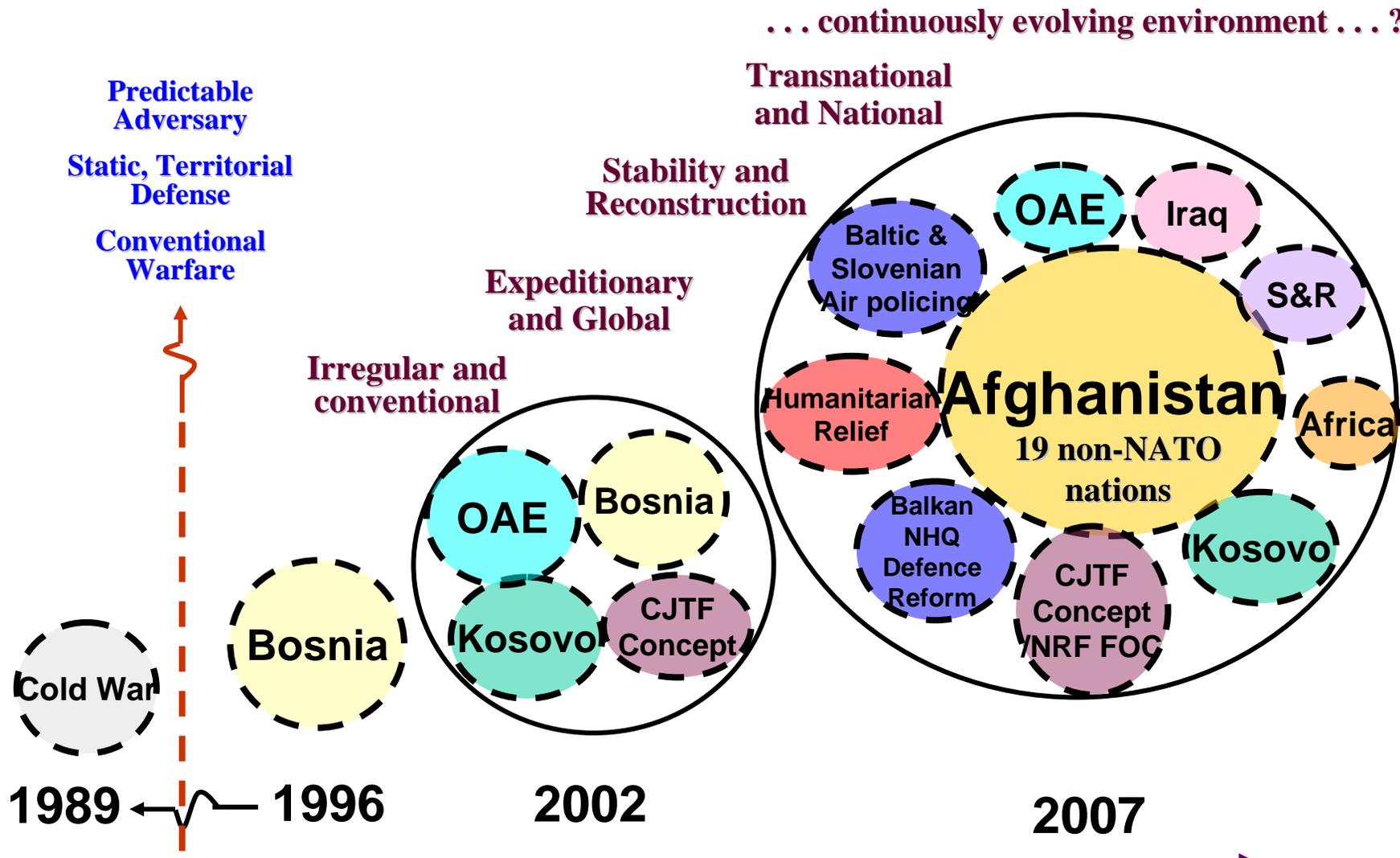


20th CENTURY	21st CENTURY
Military Approach	Broad Approach
Static	Agile
Reactive	Proactive
Regional	Global
Mass	Effects Based
Attrition	Precision
De-confliction	Coherence
Supply Point Logistics	Integrated Logistics
National Intelligence	Fused Intelligence



# NATO Challenges – Increasingly Complex Operating Environment!

Need for Integrated Capabilities



Rise in range and complexity of NATO Missions

# A Long View Focus ...

## ...Understanding the environment

We Will face Combination of Traditional and Irregular Warfare



### CONVENTIONAL

- state threat has not gone away
- decisive military action still matters
- legal/doctrine based
- hierarchical

### IRREGULAR

- population base is key
- seeks strategic effects through tactical action
- attacks asymmetrically
- does not follow rules of war
- globally networked, cellular-based

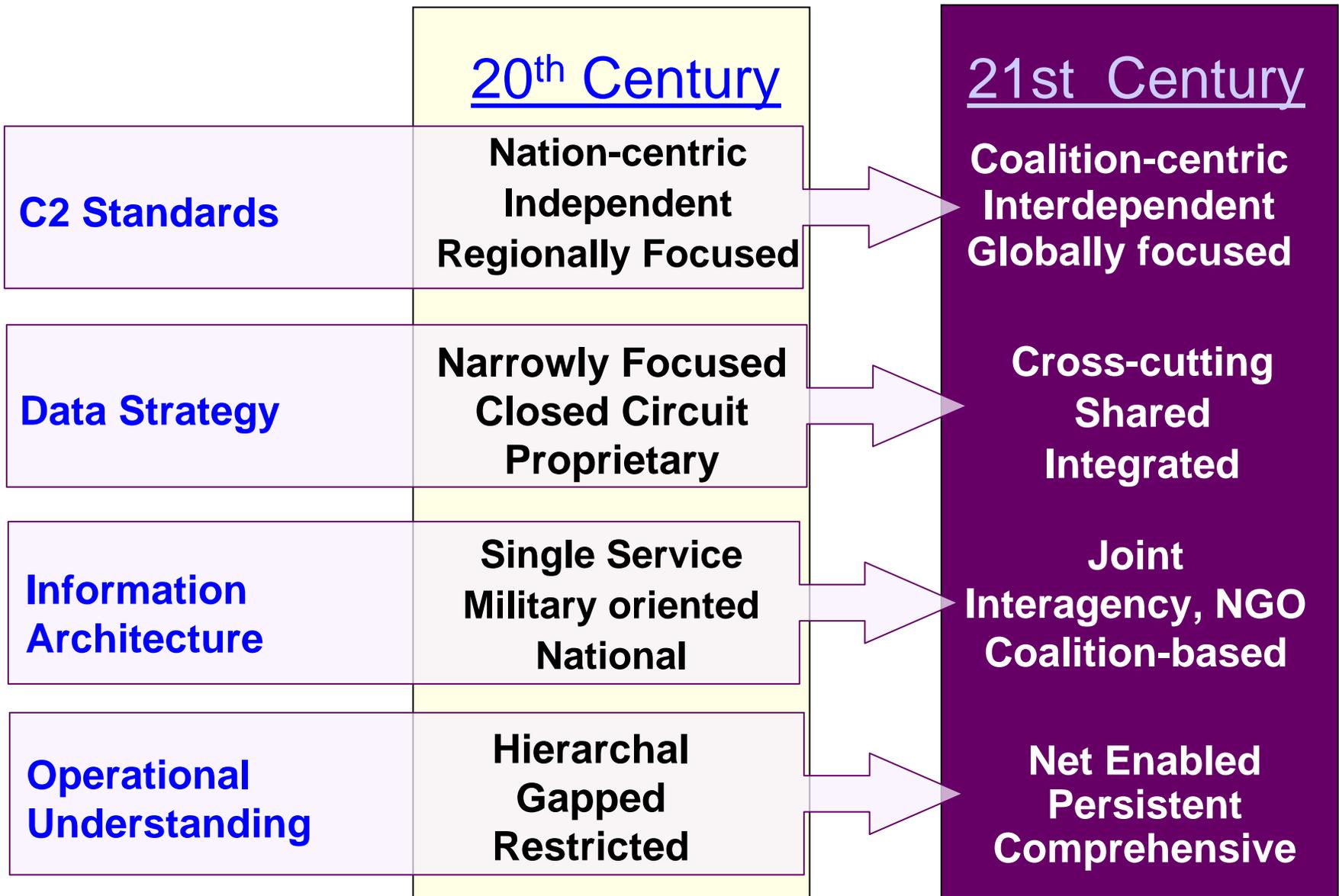
Need for balanced capabilities

### Unique Aspects

- Blends into the population
- individual goal is to kill and die
- global aspirations, will and patience to achieve it



# What it Must Look Like



# Transforming NATO

- **Harness emerging technology**
- **Interoperable Forces**
  - Joint and Multinational
- **Coherent Efforts**
  - In thought
  - In action



# *Elements of Transformation*



## ***C2 Focused Experimentation***

- NATO Friendly Force Tracking (FFT)
- Land Command & Control Information System (LC2IS)
- Radio Frequency Identification (RFID)

# ***Friendly Force Tracking (FFT)***

**ACT's concept to integrate information from national FFT systems with a common data standard into a NATO FFT data service for the NRF or other future NATO-led operation.**

- Past Experimentation
  - ISAF 2004
  - Coalition Warrior Interoperability Demonstration
  - FTEX 07
- NATO – Nation Interoperability in ISAF
- Future Experimentation on
  - Web Services
  - Security Labeling and Guarding
  - Land Track Interoperability Service
  - MIP harmonization



# ***Land Command and Control Information System***

- NATO LC2IS
  - Improves Horizontal and Vertical Information Exchange With NATO and National Systems
  - Enables Effective Command and Control of Land and Joint Forces
- NSIP procurement of LC2IS
  - Delivery of Increment 1 – 1st Quarter 2008
- Operational Experimentation
  - Allied Warrior 04 and Noble Javelin 2005
    - Highlighted Need for Automated Data Exchange Between Tactical and Operational Levels of Command
  - 2006
    - Data Exchange Between NATO and National C2 Systems Proven During ISAF Mission Rehearsal Exercise at JWC
- Future Experimentation Will Focus on Interoperability with Multilateral Interoperability Program

## ***Experimentation Program of Work – 2007-08***

- 2007 Experiments:
  - 27 C2 Related Experiments
    - Situational Awareness
    - Joint C2 Coordination Tools
    - Transition to IPv6
- 2008 Proposals:
  - 89 IS&NNEC identified experimentation proposals
    - JCOP
    - JC2IS
    - Multilateral Interoperability Program (MIP) Reference System (MRS)

