Dual Use Dilemma: A view from the ground...





National Science Advisory Board for Biosecurity 30 June 05 David R. Franz

Bioterrorism: The "Unique" Threat ?

- <u>Dual-use</u> facilities, equipment and people
 <u>Lack of real time</u> detection capabilities
- Extremely small "footprint"
- Difficult forensics and potentially no <u>attribution</u>

The <u>risk may be very, very low</u> but the *potential* for harm is ENORMOUS! …too great to ignore…

BT

So....what is Special about Biological Weapons?

- <u>Almost anyone</u> could make weapons of some kind and hide the fact
- The agents have been, and will be, available from nature
- <u>Tools</u> of manipulation will become more widely available in future
- Technical understanding and capabilities will increase in future
- Agents and tools are and will therefore be:
 - Ubiquitous
 - Legal
 - Important to our well-being
- Therefore....INTENT becomes extremely important

...and more important as technical barriers fall

We all have a Frame of Reference

Mine:

- Military Medical Biological Defense
- Infectious Disease Research
- UNSCOM, the 'Trilaterals' and CTR

Yours:

Likely different

Our Frames of reference impact our perception of intent

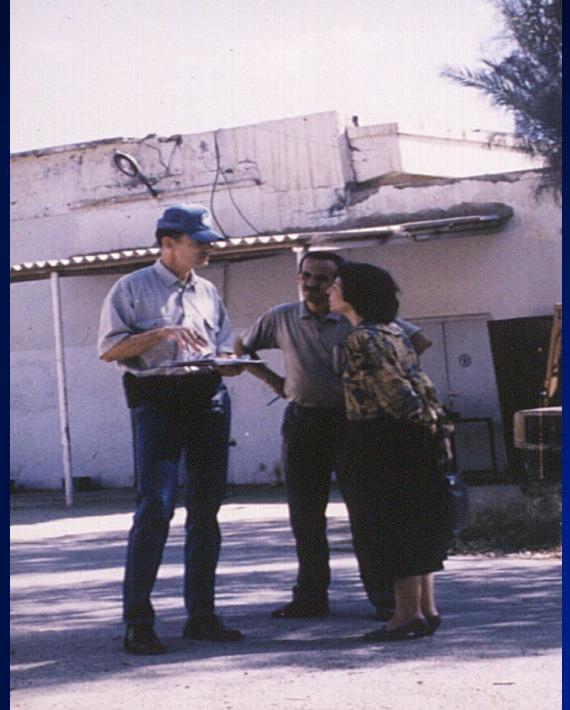
The Dual-use Nature of:

People

Facilities

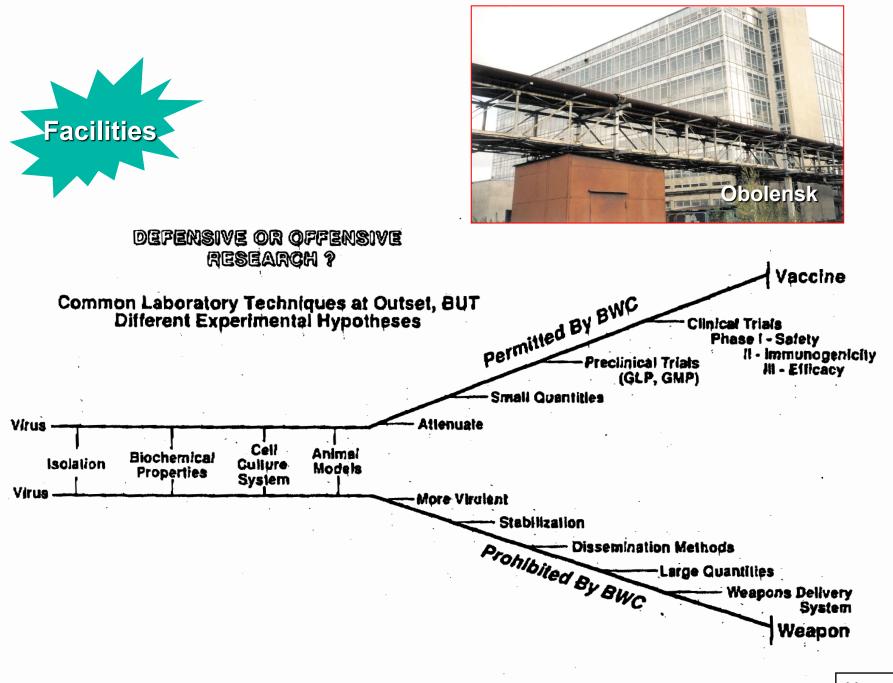
Equipment











Huxsoll, 1989

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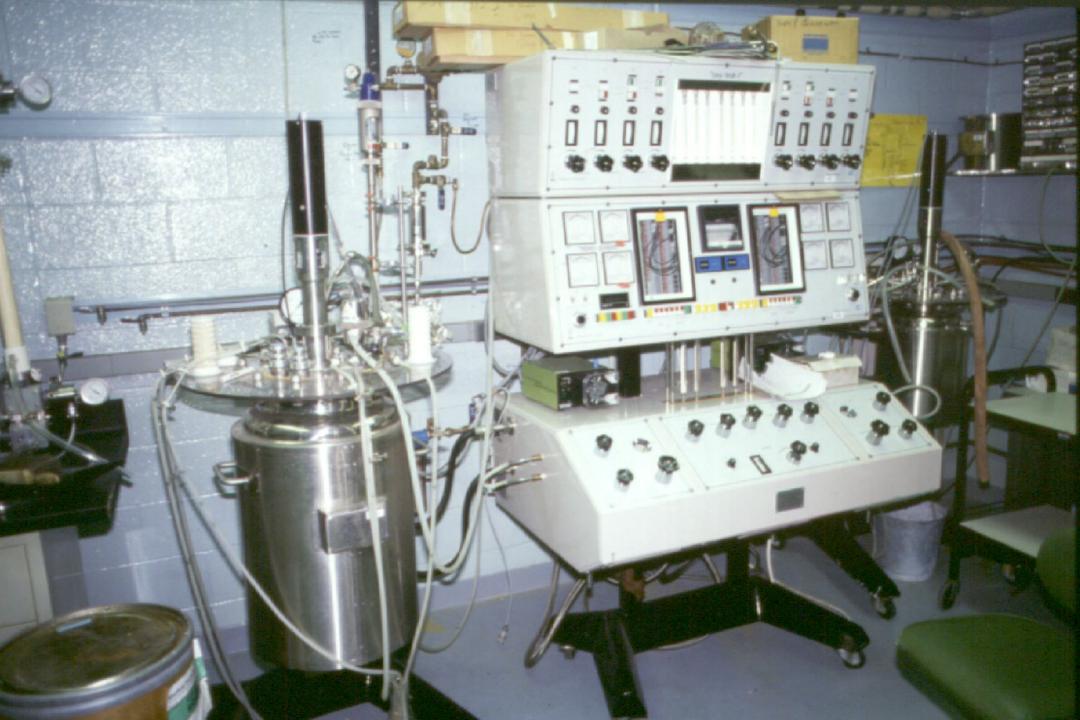




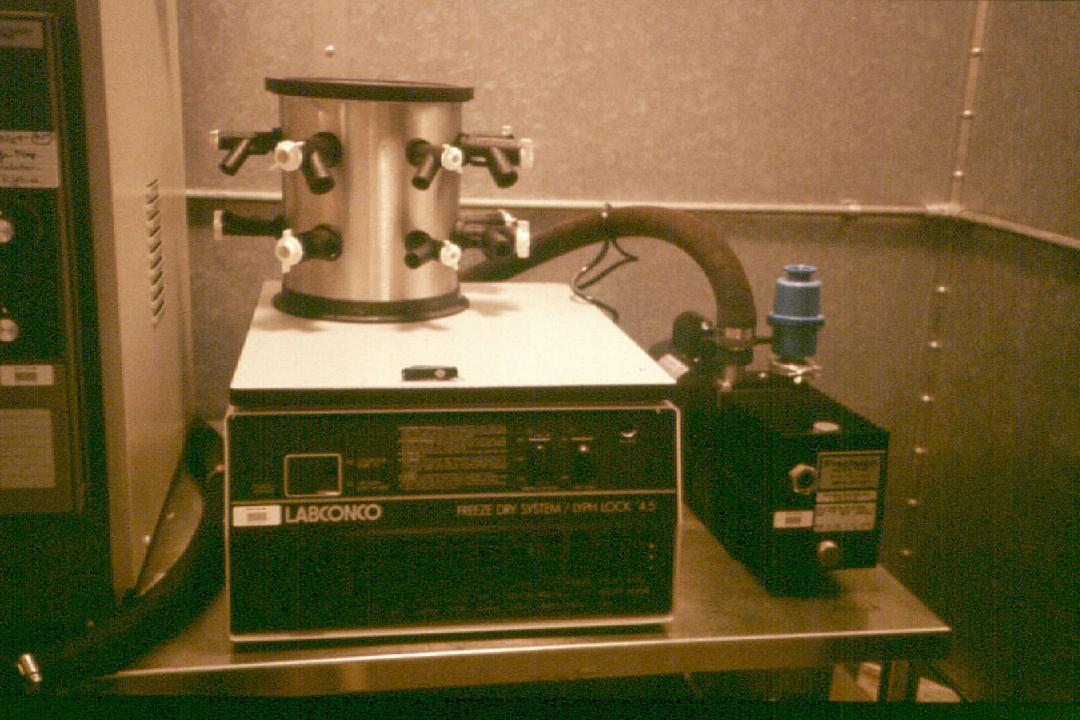




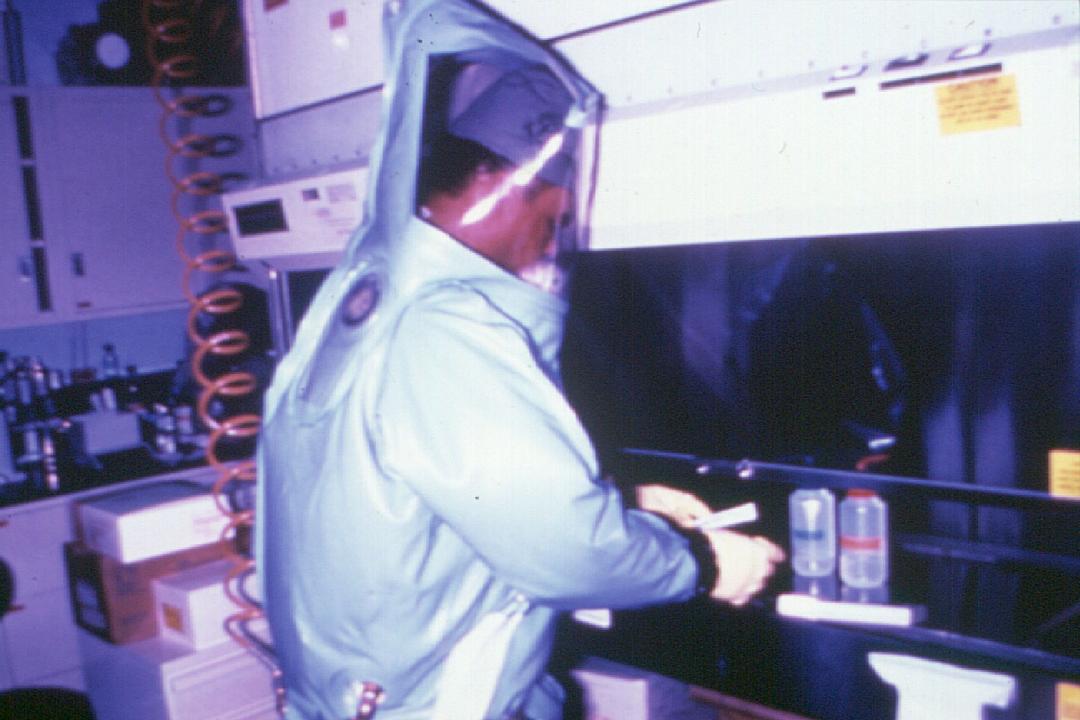




















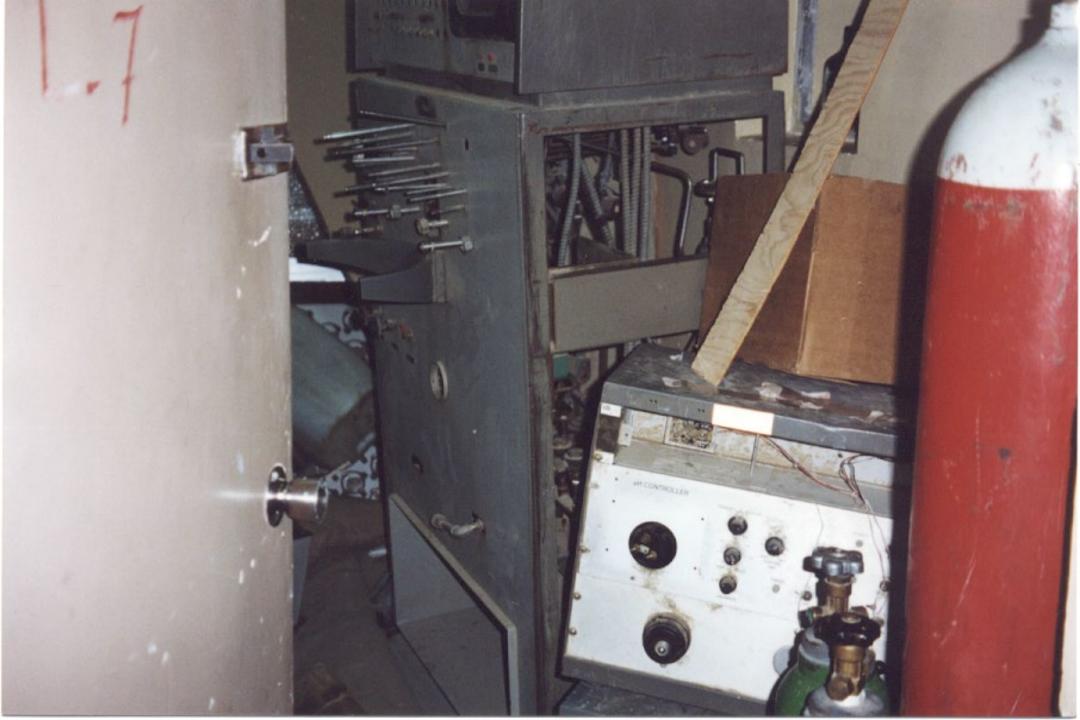


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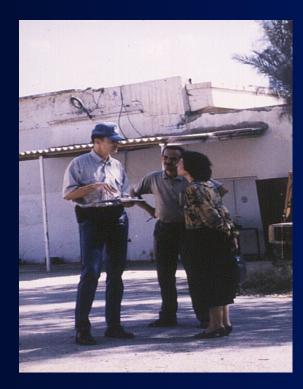




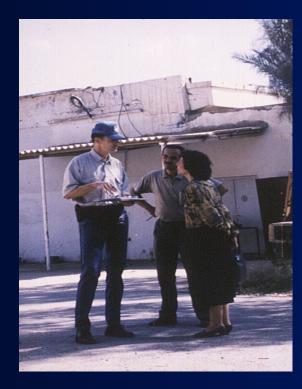


Iraq and the FSU...and the 90s may have been 'the easy ones'

- The bugs are still available
- The technologies are getting better
- Our understanding is getting better
- The terrorist footprint is much smaller
- It's a much smaller world
- Intent is even more important

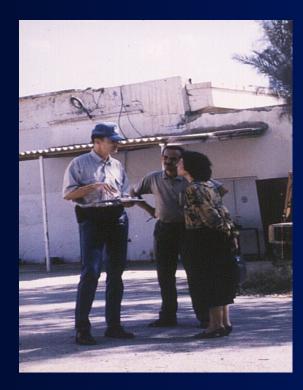






Regulation





Regulation

Progress



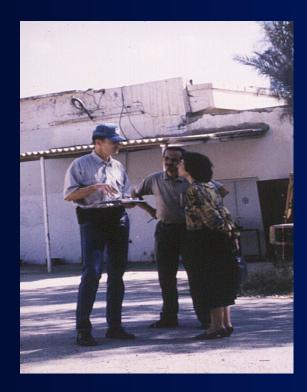


Regulation

Progress

Intent





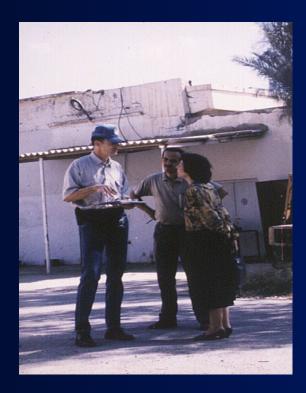
Regulation

Progress

Intent

Perception





Regulation

Progress

Intent

Perception

Education





Regulation

Progress

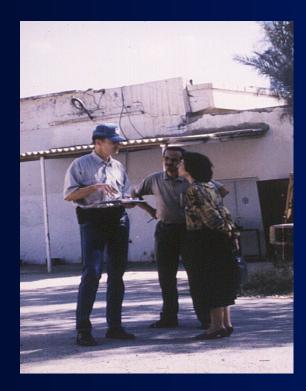
Intent

Perception

Education

Communication





Regulation

Progress

Intent

Perception

Education

Communication

Balance

