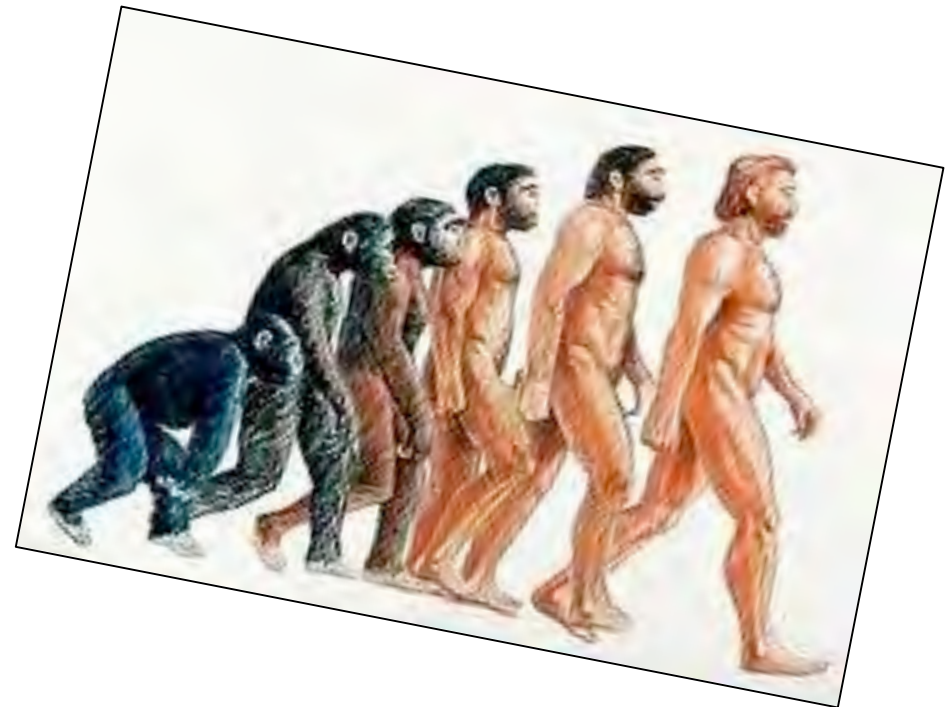


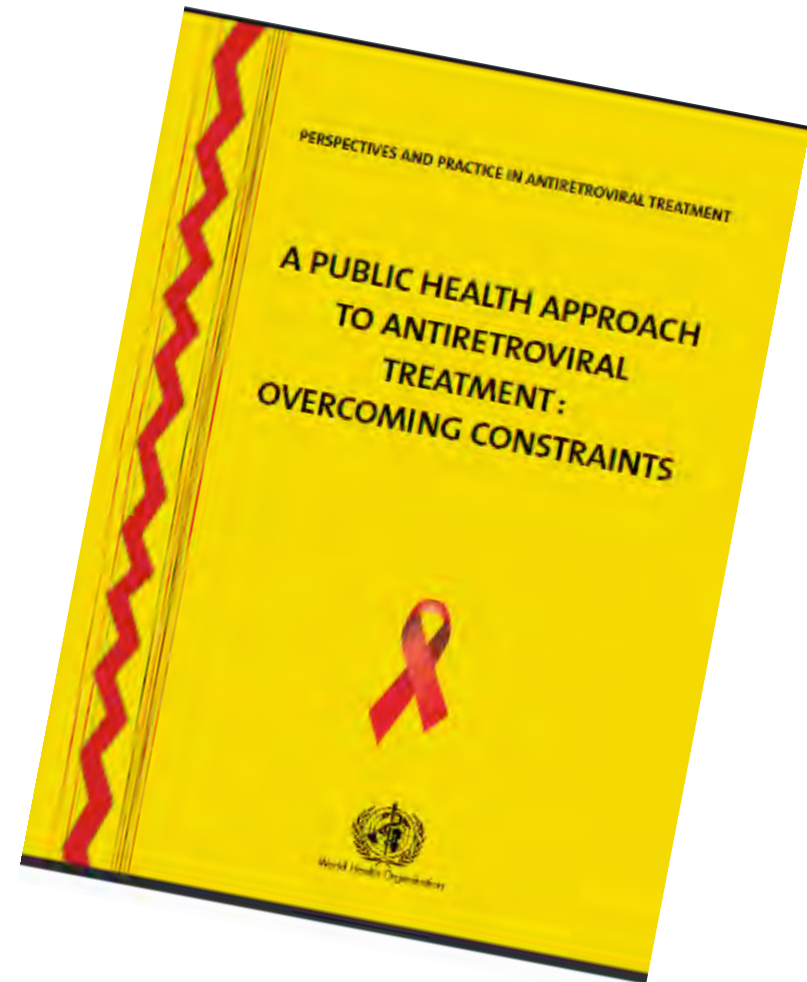
From '3 by 5' to *Treatment 2.0*:

Revolution or Evolution?

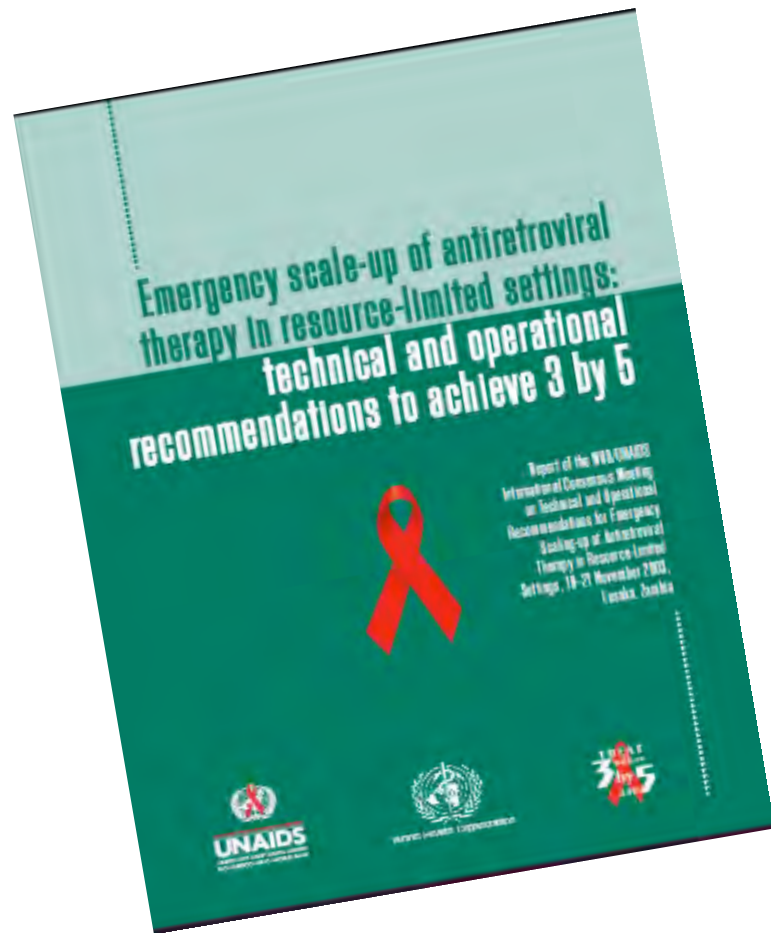


The Public Health Approach

- ✓ Standardized treatment protocol and simplified clinical monitoring
- ✓ Optimal use of available human resources
- ✓ Involvement of community members and people living with HIV
- ✓ Strategies to minimize cost
- ✓ Human rights protected and promoted



Implementing ART in Resource-Limited Settings

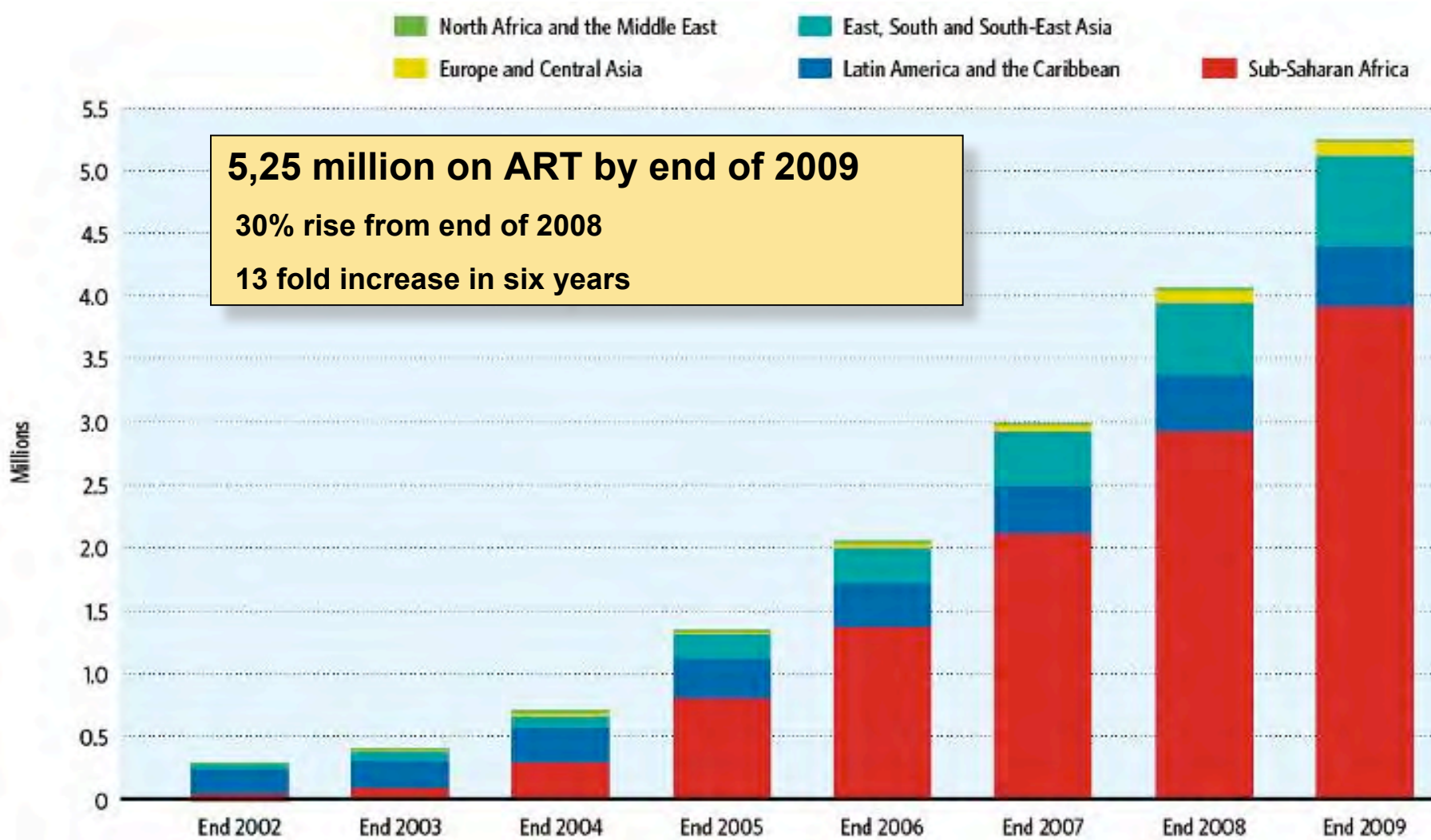


- ✓ People living with and affected by HIV as leaders in ART scale up
- ✓ Essential package of care and prevention services to support ART
- ✓ Service delivery, human resources & training
- ✓ Management of commodities and supply (lab monitoring package)
- ✓ Strategic information

Case Studies in ART Scale-up



Number of people receiving ART in low and middle income countries by region 2002–2009



ART scale up in resource limited settings

Implementation has been greatly influenced by WHO guidelines

- 2002
- 2003
- 2006
- **2010**



Objectives: Support
Universal Access

Primary Audience: Treatment
advisory boards, national AIDS
programmes & policy makers

Current challenges

- Transition from emergency response
- Treatment gap
- Leverage HIV and TB preventive benefits of ART
- Integrated approaches to broaden health outcomes
- Financing



Treatment 2.0: Accelerated optimization of treatment

Treatment 2.0:

A new prevention-treatment paradigm in the global response to AIDS

Discussion Note

9 June 2010

Senior Strategy Meeting on Treatment 2.0

Co-hosted by UNAIDS, International AIDS Society and the World Health Organization

Overview

The Challenge

We have made significant progress in the global response to AIDS with close to five million people on treatment and a 17% reduction in new infections since 2001. The most recent WHO guidelines for antiretroviral therapy call for earlier initiation of treatment and use of simpler, better drug regimens – recommendations that will further decrease morbidity and mortality as well as vertical and horizontal transmission. However, emerging challenges threaten the gains we have made. Competing global priorities and an economic crisis have begun to divert commitments away from AIDS just as the effects of the investment in HIV prevention, treatment and care efforts are showing real results. Meanwhile, there are several intrinsic challenges that we face:

- HIV testing is under-utilized. Most people still find out they are infected when they develop clinical symptoms of AIDS;
- Generic, cookie cutter approaches to prevention do not provide the needed substantial reduction in new infections, especially within concentrated epidemics that require tailored, population-specific interventions;
- Only one-third of people who need it are on treatment;



Treatment 2.0: Priorities



IS THIS THE FUTURE OF TREATMENT?

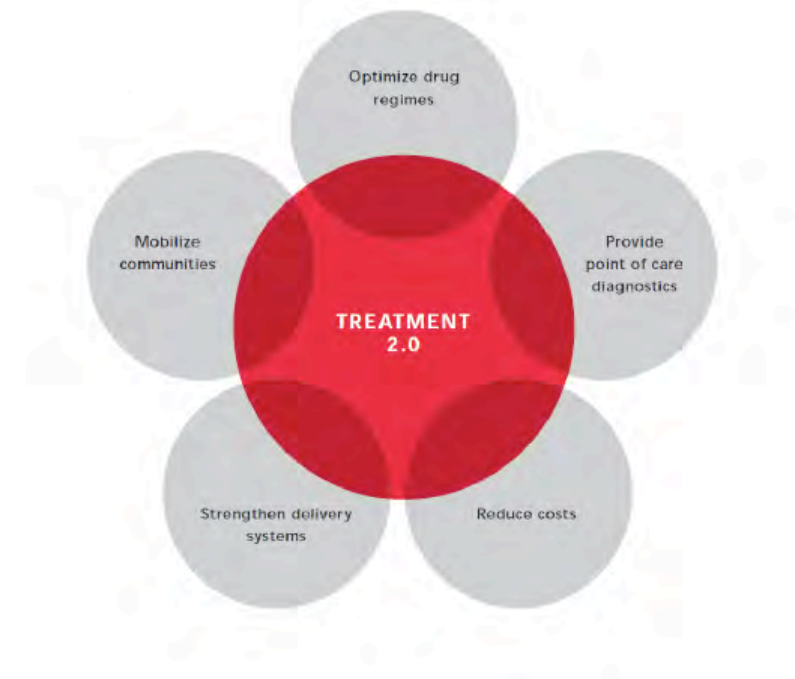
I - Optimize drug regimens

II – Promote diagnostics using point of care and other simplified technologies

III – Reduce costs

IV – Adapt delivery systems

V – Mobilize communities, protect human rights

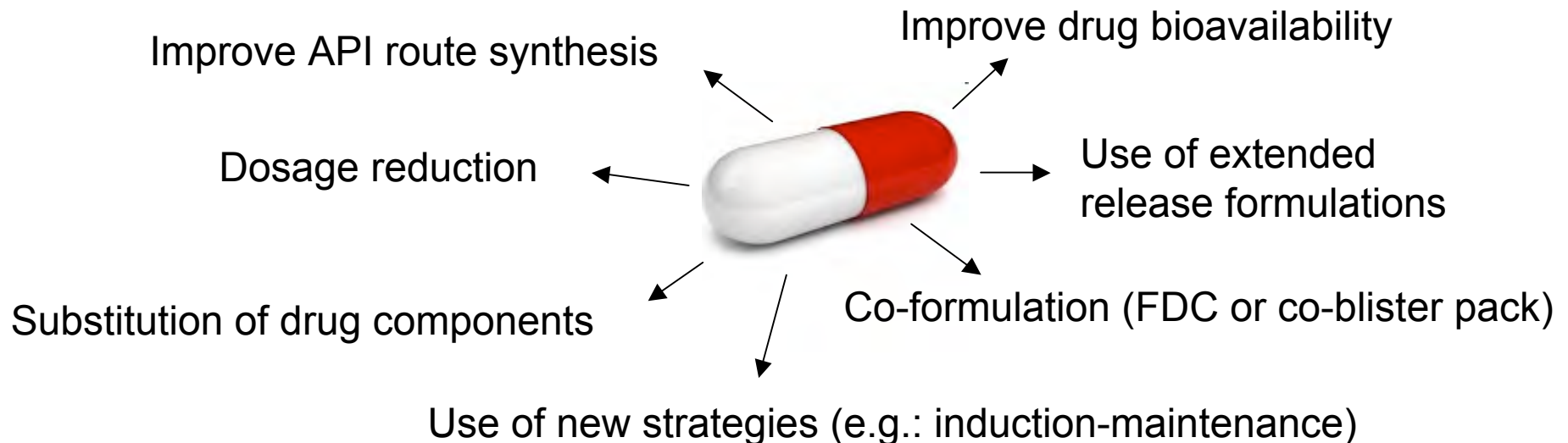


I. Optimize Drug Regimens

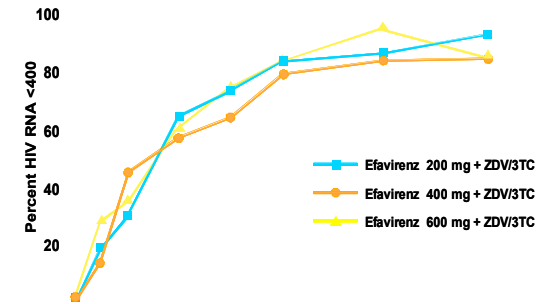
- ✓ Reduce pill burden/pill size
- ✓ Reduce toxicity
- ✓ Minimize drug-drug interactions
- ✓ Minimize laboratory monitoring needs
- ✓ Safe to use in adults, adolescents, children and pregnant women



- Improved adherence & clinical outcomes (maximize time on effective 1st line therapy)
- Improved convenience (patient and programme levels)
- Reduced costs (direct and indirect)



Antiretrovirals with potential for dose optimization



Drug	Current dose	Potential optimised dose
AZT	300mg BID	200 mg BID
3TC	300 mg OD	150 mg OD
EFV	600 mg OD	400 mg OD
LPV/r	400/100 mg BID	200/100 or 200/150 mg BID
ATV/r	300/100 mg OD	300/50 or 200/50 mg OD
DRV/r	600/100 BID	400/50 mg OD
RTV	100mg (booster)	50mg (booster)
RAL	400 BID	100-200 mg BID

Several drugs have potential for dose-optimisation, providing equivalent efficacy with an improved safety profile and lower costs

Potential areas for Optimization?

1st Line



TDF-FTC-EFV



Simplification of tenofovir route synthesis

Use of 3TC instead of FTC

Reduced dosage of 3TC and EFV

Substitution of EFV for Rilpivirine or NVPxr or Lersivirine

2nd Line



AZT-3TC + LPVr



Use of co-blister packs

Reduced dose of AZT, 3TC and LPVr

Substitution of 3TC for Apricitabine or Racivir or Elvucitabine

Substitution of LPVr for ATVr or DRVr

Substitution of AZT/3TC for integrase inhibitors (Raltegravir, Elvitegravir or GSK 572)

Substitution of RTV for cobicistat or SPI-452

Maintenance with PI monotherapy

II. Promote diagnostics using point of care and other simplified technologies

- Develop and implement diagnostic and monitoring tools that can be used at the first line of service delivery
- Rapid HIV diagnosis, CD4, Viral load and HIV incidence assays are priorities
- Quality Assurance/Quality Control for standard and new technologies

III. Reduce Costs

- Make drugs more affordable
- Make diagnostics more affordable
- Reduce hospitalization, monitoring and out-of-pocket expenses through treating earlier
- Prevent further HIV and TB infections

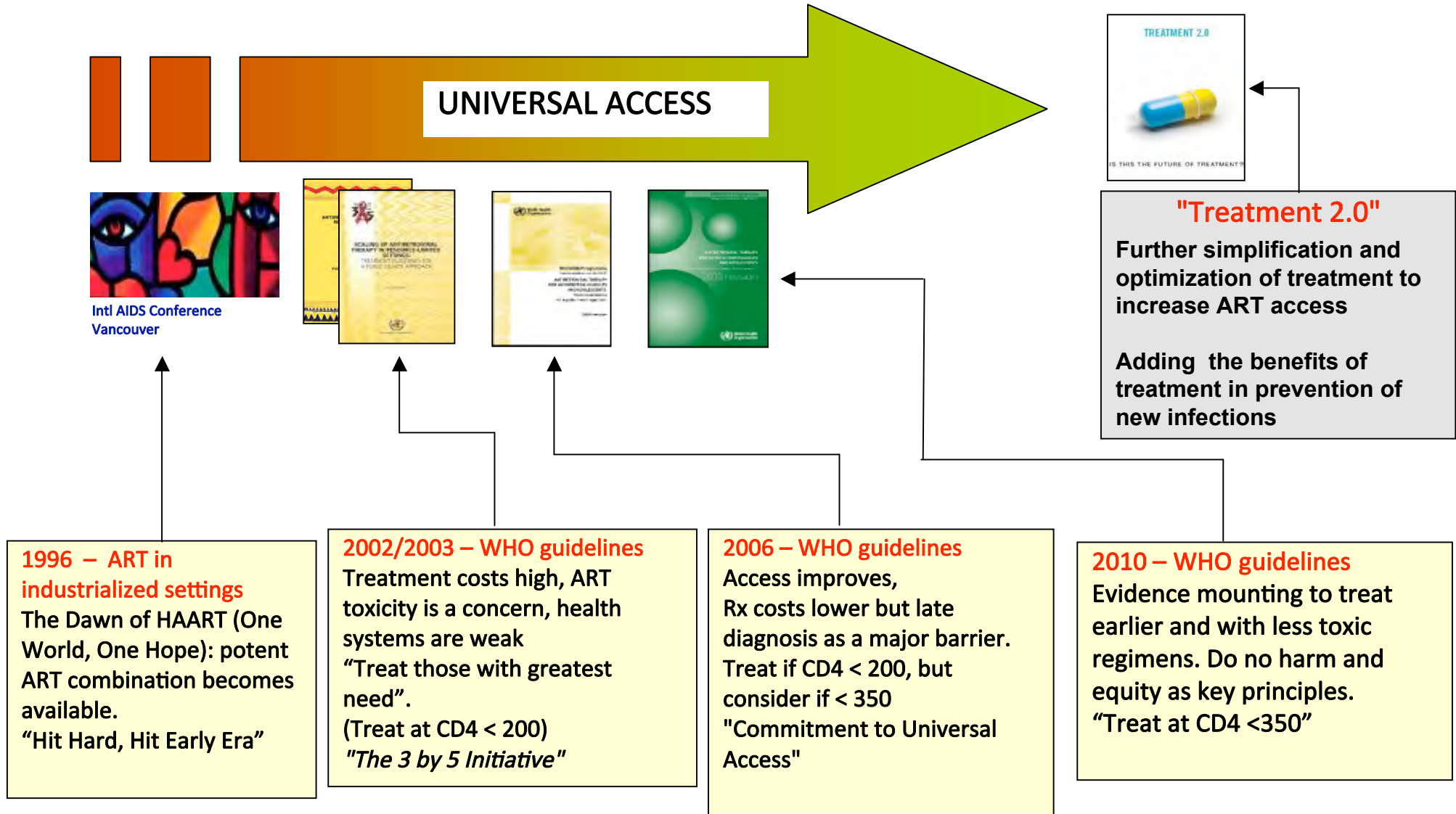
IV. Adapt Delivery Systems

- Decentralize services
- Integrate delivery systems, especially prevention, diagnosis and treatment
- Expand options for HIV testing and counselling in the health sector and at the community level as a gateway to treatment and prevention services
- As ART becomes simpler, expand task-shifting and use of primary health centres and community systems for delivery
- Shift from stand-alone ART services to integration with primary care, TB, antenatal, maternal and child health, sexual and reproductive health and drug dependence services
- Strengthen procurement and supply systems

V. Mobilize Communities

- Strengthen the demand side for treatment
- Engage communities in testing and counselling, service delivery, adherence and provision of care and support
- Ensure that human rights of all affected communities and people living with HIV are protected
- Achieve equity in access to treatment for all communities

New knowledge leads to periodic updating of guidelines and advocacy



Treatment 2.0

rrrrrrrEVOLUTION!!