



# Universe Awareness UNAWE

Building the Scientific Mind Vancouver, Canada May 29, 2007 Carolina Ödman carolina.odman@unawe.org http://www.unawe.org/



## **UNAWE** Philosophy

- Initiative for a worldwide scientific culture.
- Expose very young (ages 4 10 years), underprivileged children to the inspirational aspects of astronomy.
  - Broaden their perspective
  - Enhance their understanding of the world
  - Demonstrate the power of self-determined thought
- By broadening children's minds, UNAWE hopes to stimulate tolerance and internationalism



#### Motivation

- Beauty and size of the Universe excite young children
- Basic knowledge of the Universe is a Birthright
- Ages 4 10 are crucial for child development
- Knowledge about the Universe can broaden the mind
- Why young and underprivileged children?
  - Need is greatest
  - Cognitive disparities increase with age
  - Cultural differences less pronounced



# Astronomy for Peace Education

- Science
  - Investigation, curiosity
  - Ambassador for all sciences
  - Development of technology
- Culture
  - Historypast & in the making!
  - Cultural heritage

- Multidisciplinary
  - The big questions
- FUN!
  - Beautiful images
  - Extreme conditions
  - Unreachable yet available to all



#### Astronomy as Science

- Curiosity and sense of adventure
- Rational explanations
- Astronomy is multidisciplinary
  - physics, chemistry, maths, computer science, biology
- Super-history
- Challenging
  - Light from different times
  - Coherent movement across the sky
- Development of technology
  - Opportunities



## Astronomy as Culture

- Humankind's scientific and cultural heritage
  - Tool for positioning, navigation, timing (seasons)
  - Clock and calendar
  - Myths and legends
    - Serving educational purpose
    - Entertainment too!
  - Culture and emotional link to the sky, Ownership
    - Rational only leaves room for emotional catches such as dogma and superstition
    - Use FOLKLORE
    - e.g. Immigrant communities



# Astronomy as ambassador for diversity

- Cultural awareness identity and tolerance through folklore
  - Exotic diversity (animal constellations: zoological diversity)
- Appreciation of diversity in building a value system



## Astronomy as heritage

- Astronomy a household name, part of the landscape
- "Training" as dialogue and enactment of the evolution of human understanding
- Delivery through communities: ownership enabling discussion of fears and dogmatic beliefs
- Debate among adults illustrates relativity of knowledge



# Astronomy as Common Social Ground

- Bottom-up approach values people's contribution
  - Better respect
  - Better self-esteem

For both the individuals and the communities

- Reproduced later in life



#### Conclusions

- Astronomy more than rich and fun science, also emotional link to the sky
- History and culture (diverse human family)
- Multidisciplinary (environment, etc.)
- Tool for a culture of peace
  - In its subject matter but also in the delivery in an astronomy programme
- That's what UNAWE hopes to achieve