

Landasan Filosofis **EKO ARSITEKTUR**

Oleh : A. Rudyanto Soesilo

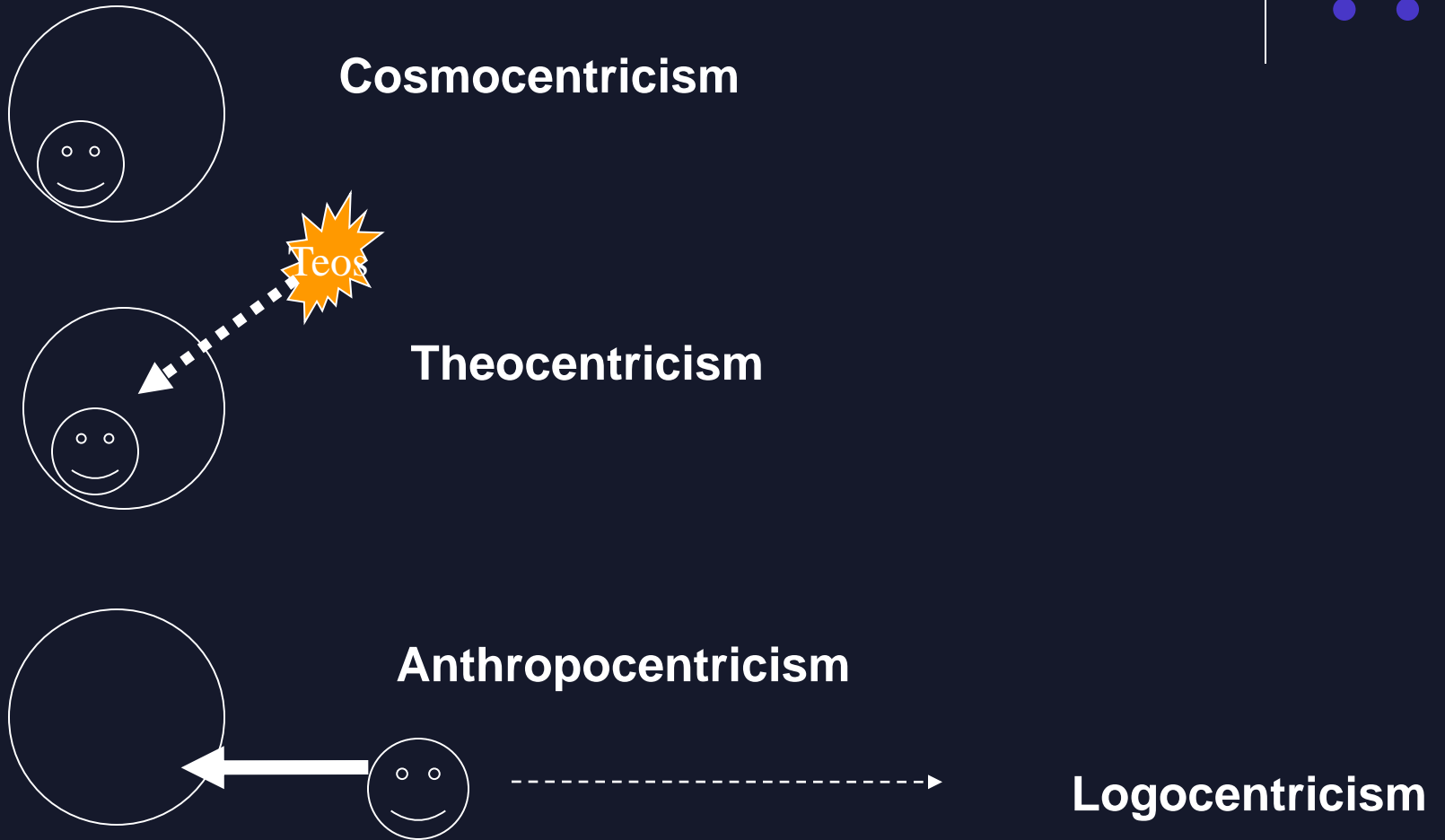


Environmental ethics



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Pergolakan pemikiran manusia



Environmental ethics

- is the part of environmental philosophy which considers extending the traditional boundaries of ethics from solely including humans to including the non-human world.
- It exerts influence on a large range of disciplines including environmental law, environmental sociology, ecotheology, ecological economics, ecology and environmental geography.

environmental ethics



Marshall's Libertarian extension

- echoes a civil liberty approach In environmentalism, though, the community is generally thought to consist of non-humans as well as humans.
- Andrew Brennan was an advocate of ecologic humanism (eco-humanism), the argument that all ontological entities, animate and in-animate, can be given ethical worth purely on the basis that they exist.
- The work of Arne Næss and his collaborator Sessions also falls under the libertarian extension, although they preferred the term "deep ecology". Deep ecology is the argument for the intrinsic value or inherent worth of the environment – the view that it is valuable in itself. Their argument, incidentally, falls under both the libertarian extension and the ecologic extension.



- **Ecologic extension**

- places emphasis not on human rights but on the recognition of the fundamental interdependence of all biological (and some abiological) entities and their essential diversity.
- Ecologic Extension is best thought of as a scientific reflection of the natural world.
- Ecological Extension is roughly the same classification of Smith's eco-holism, and it argues for the intrinsic value inherent in collective ecological entities like ecosystems or the global environment as a whole entity.



Conservation ethics

- is an extension of use-value into the non-human biological world. It focuses only on the worth of the environment in terms of its utility or usefulness to humans.
- It contrasts the intrinsic value ideas of 'deep ecology', hence is often referred to as 'shallow ecology', and generally argues for the preservation of the environment on the basis that it has extrinsic value – instrumental to the welfare of human beings.
- Conservation is therefore a means to an end and purely concerned with mankind and intergenerational considerations. It could be argued that it is this ethic that formed the underlying arguments proposed by Governments at the Kyoto summit in 1997 and three agreements reached in Rio in 1992

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Humanist theories

- Following the bio-centric and eco-holist theory distinctions, Humanist theories as those that require a set of criteria for moral status and ethical worth, such as sentience
- This applies to the work of Peter Singer who advocated a hierarchy of value similar to the one devised by Aristotle which relies on the ability to reason. This was Singer's solution to the problem that arises when attempting to determine the interests of a non-sentient entity such as a garden weed.

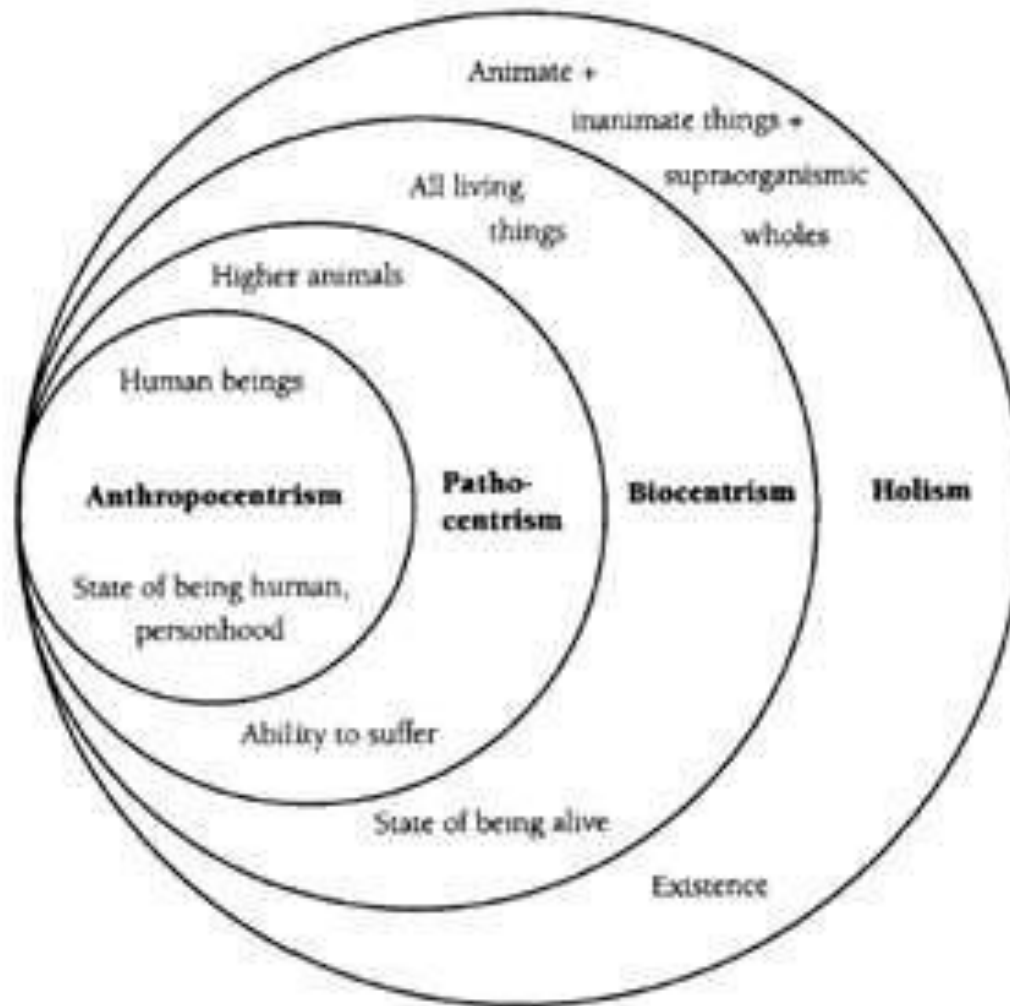
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Applied theology

- The Christian world view sees the universe as created by God, and humankind accountable to God for the use of the resources entrusted to humankind. Ultimate values are seen in the light of being valuable to God
- In many countries this relationship of accountability is symbolised at harvest **thanksgiving**. (B.T. Adeney : Global Ethics in New Dictionary of Christian Ethics and Pastoral Theology 1995 Leicester)





Anthropocentrism

- simply places humans at the centre of the universe; the human race must always be its own primary concern. It has become customary in the Western tradition to consider only our species when considering the environmental ethics of a situation.
- Therefore, everything else in existence should be evaluated in terms of its utility for us, thus committing speciesism.
- All environmental studies should include an assessment of the intrinsic value of non-human beings. In fact, based on this very assumption, a philosophical article has explored recently the possibility of humans' willing extinction as a gesture toward other beings.

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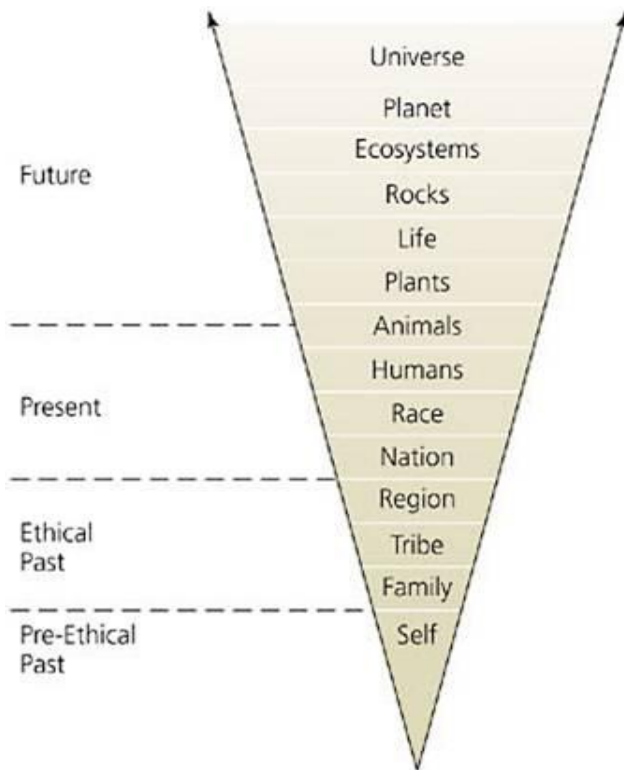
Deep ecology

Deep ecology is a contemporary ecological philosophy that recognizes an inherent worth of all living beings, regardless of their instrumental utility to human needs. The philosophy emphasizes the interdependence of organisms within ecosystems and that of ecosystems with each other within the biosphere. It provides a foundation for the environmental, ecology and green movements and has fostered a new system of environmental ethics.

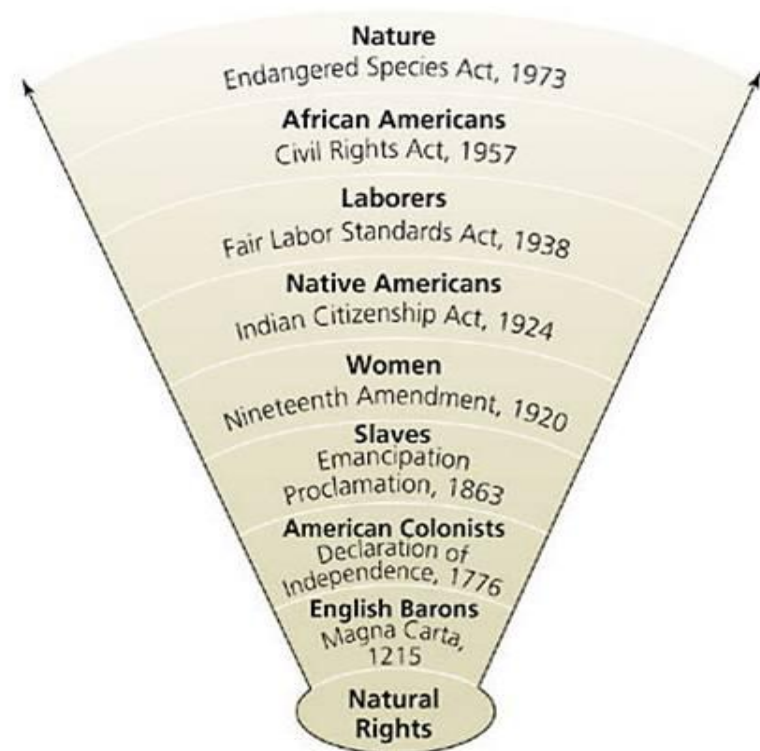
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The evolution of Ethics



(a) The evolution of ethics



(b) The expanding concept of rights

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Deep ecology's core principle

is the belief that, like humanity, the living environment as a whole has the same right to live and flourish. Deep ecology describes itself as "deep" because it looks more deeply into the actual reality of humanity's relationship with the natural world and arrives at philosophically more profound conclusions than that of the prevailing view of ecology as a branch of Darwinian biological science.

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Deep ecology

- Deep ecology does not subscribe to anthropocentric environmentalism which is concerned with conservation of the environment only for exploitation by and for human purposes since this is grounded in a quite different set of philosophical assumptions.
- Deep ecology takes a more holistic view of the world human beings live in and seeks to apply to life the understanding that the separate parts of the ecosystem (including humans) function as a whole. Deep ecology advocates wilderness preservation, human population control and simple living.

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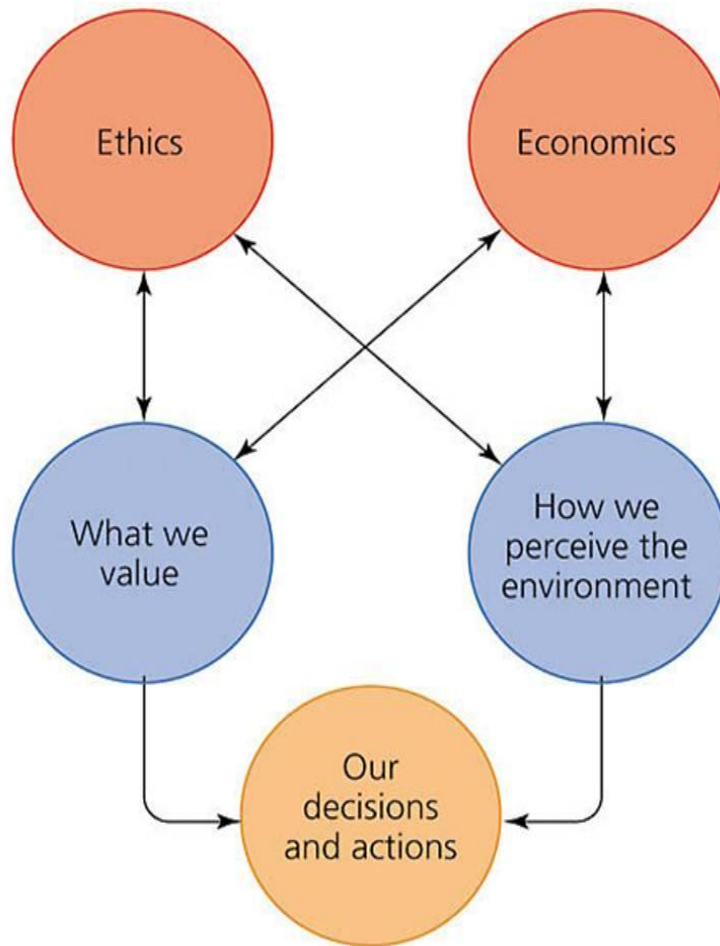


Green party or ecologist party

- is a formally organized political party based on the principles of Green politics.
- These principles usually include social justice, reliance on grassroots democracy, nonviolence, and an emphasis on environmentalism.
- "Greens" believe that the exercise of these principles leads to world health.
- The party's platform is largely considered far-left in the political spectrum.

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Sustainable development,

- ◆ eco-design, eco-friendly architecture, earth-friendly architecture, environmental architecture, natural architecture



"Sustainable development

- ◆ **Definition:**

- ◆ "Sustainable development is development which meets the needs of the present without compromising the ability of future generations to meet their own needs."

~World Commission on Environment and Development



"Sustainable development

- ◆ The term *sustainable development* means that builders, architects, designers, community planners, and real estate developers strive to create buildings and communities that will not deplete natural resources. The goal is to meet today's needs using *renewable resources* so that the needs of future generations will be provided for.



- ◆ Sustainable development attempts to minimize greenhouse gases, reduce global warming, preserve environmental resources, and provide communities that allow people to reach their fullest potentials.



Sustainable development will have many, of these characteristics:

- ◆ Green architecture and eco-friendly building practices
- ◆ Local building materials
- ◆ Natural, bio-degradable building materials
- ◆ Local workers
- ◆ Renewable sources for water
- ◆ Renewable energy sources such as solar and wind
- ◆ Protection of natural habitats



Sustainable development will have many, of these characteristics:

- ◆ Planned replacement for any resources used
- ◆ Non-polluting construction practices and industries
- ◆ Smart Growth
- ◆ Walkable communities
- ◆ Mixed-use communities that combine residential and commercial activities
- ◆ New Urbanism
- ◆ Adaptive reuse of older buildings
- ◆ Use of recycled architectural salvage



Organic architecture is

- ◆ a philosophy of architecture which promotes harmony between human habitation and the natural world through design approaches so sympathetic and well integrated with its site, that buildings, furnishings, and surroundings become part of a unified, interrelated composition.



Green architecture

◆ **Definition:**

Green architecture, or green design, is an approach to building that minimizes harmful effects on human health and the environment. The "green" architect or designer attempts to safeguard air, water, and earth by choosing *eco-friendly* building materials and construction practices.



Green architecture may have many of these characteristics:

- ◆ Ventilation systems designed for efficient heating and cooling
- ◆ Energy-efficient lighting and appliances
- ◆ Water-saving plumbing fixtures
- ◆ Landscapes planned to maximize passive solar energy
- ◆ Minimal harm to the natural habitat



Green architecture may have many of these characteristics:

- ◆ Alternate power sources such as solar power or wind power
- ◆ Non-synthetic, non-toxic materials
- ◆ Locally-obtained woods and stone
- ◆ Responsibly-harvested woods
- ◆ Adaptive reuse of older buildings
- ◆ Use of recycled architectural salvage
- ◆ Efficient use of space



The Gaia Movement

"Gaia" a Greek mythology

- The term "Gaia" comes from Greek mythology, where it is the name of the Goddess of the Earth.
- In the late 1960s, independent ecologist and environmentalist James Lovelock used the name in his Gaia hypothesis, which posits that the earth is a superorganism.
- This theory has gained much support in the environmentalist movement. Its use here is similar to the Feminist Movement or the Civil Rights Movement.

The Gaia Movement

- The Gaia Movement is an international network of individuals and groups that, like the Ecology movement are concerned that Globalization may not be sustainable and aim to promote ecologically sustainable development.

The Gaia hypothesis

- , also known as Gaia theory or Gaia principle, proposes that organisms interact with their inorganic surroundings on Earth to form a self-regulating, complex system that contributes to maintaining the conditions for life on the planet.
- Topics of interest include how the biosphere and the evolution of life forms affect the stability of global temperature, ocean salinity, oxygen in the atmosphere and other environmental variables that affect the habitability of Earth.


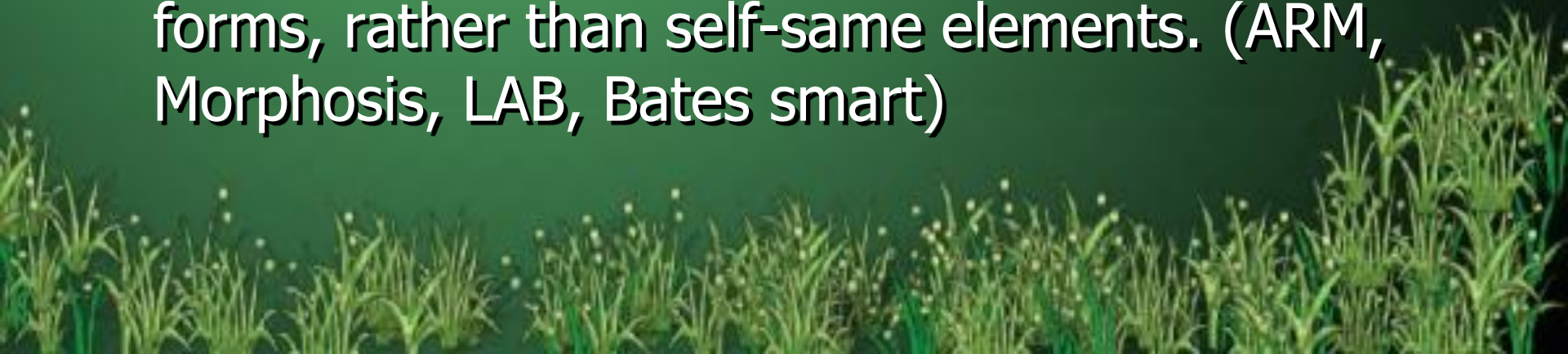


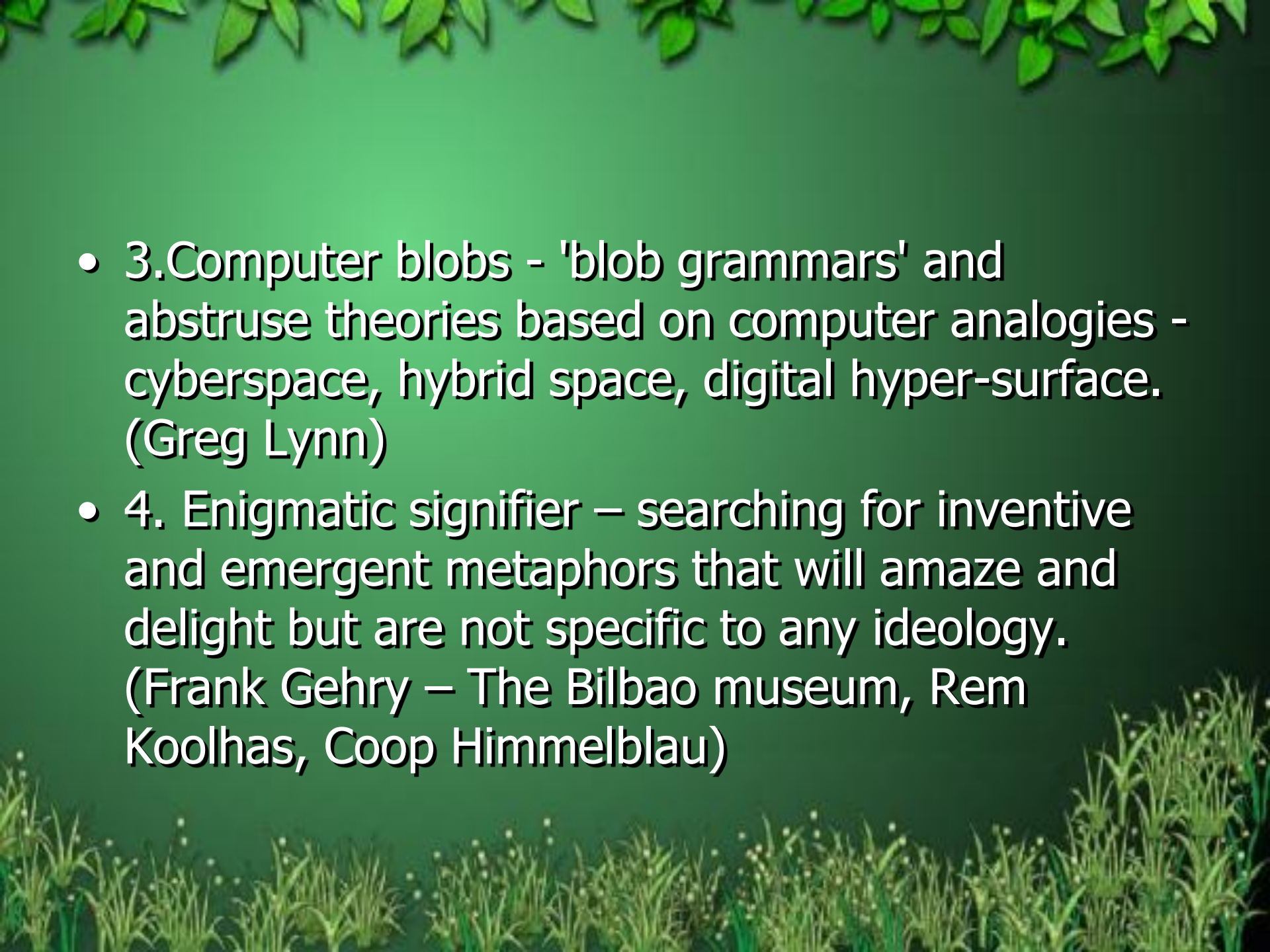
Ecology and Architecture

The study of living systems has influenced architectural design in various ways, although, the results suggest that architects and designers do not truly comprehend how living systems function, but rather try to borrow new ideas from science and ecology and express them in architecture in a rather superficial way.

'The architecture of the jumping universe'

- Charles Jencks (1995) in his book 'The architecture of the jumping universe' and other articles, describes six different categories for compartmentalizing contemporary architecture, which, according to his view, manifest latest scientific thought. These categories are:

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- 1. Organi-Tech – architects continuing an obsession with technology and structural expression while at the same time taking into account environmental aspects. (Ken Yeang, Renzo Piano, Richard Rogers, Nicholas Grimshaw)
 - 2. Fractals – expressing self-similar, evolving forms, rather than self-same elements. (ARM, Morphosis, LAB, Bates smart)
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- 3. Computer blobs - 'blob grammars' and abstruse theories based on computer analogies - cyberspace, hybrid space, digital hyper-surface. (Greg Lynn)
 - 4. Enigmatic signifier – searching for inventive and emergent metaphors that will amaze and delight but are not specific to any ideology. (Frank Gehry – The Bilbao museum, Rem Koolhaas, Coop Himmelblau)

- 5. Datascape - constructing datascapes based on different assumptions and then allowing the computer to model various results around each one. These are then turned into designs which create new forms of bottom-up organization not possible to realize before the advent of fast computation. (MVRDV)
- 6. Landforms – The basic metaphor of the earth as a constantly shifting ground rather than the terra firma we assume. Matter comes alive in this architecture at a gigantic scale. (Peter Eisenman, FOA's Yokohama Port Terminal)