چکیده:

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مقدمه:

I.T.

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G.R.Taylor **« The Natural History Of Mind »** :

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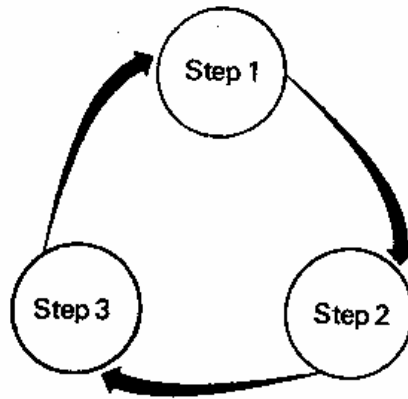:

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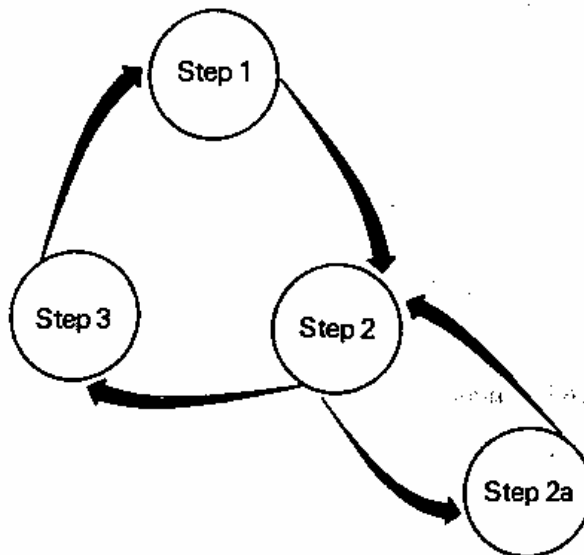(   )

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Single-loop learning rests in an ability to detect and correct error in relation to a given set of operating norms:

Double-loop learning depends on being able to take a "double look" at the situation by questioning the relevance of operating norms:

Step 1 = the process of sensing, scanning, and monitoring the environment.

Step 2 = the comparison of this information against operating norms.

Step 2a = the process of questioning whether operating norms are appropriate.

Step 3 = the process of initiating appropriate action.

Exhibit 4.2. Single- and double-loop learning

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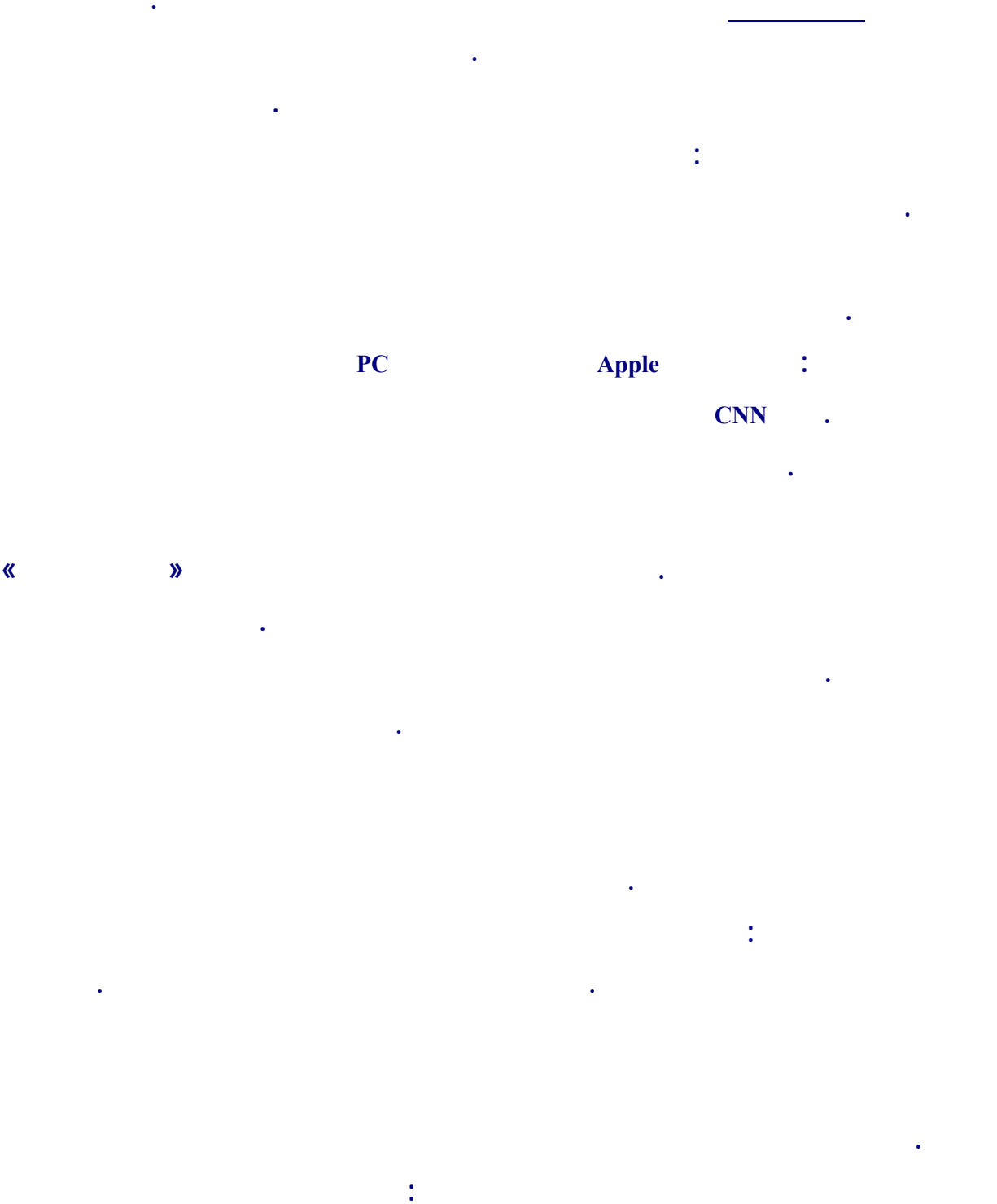
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Principle 5: *Learn to Learn*
- Scan and ancitipate environmental change
- Double-loop learning
- Emergent design

Principle 1: *Build the "Whole" into the "Parts"*
- Visions, values, and culture as corporate "DNA"
- "Networked intelligence"
- Structures that reproduce themselves
- Holistic teams; diversified roles

Holographic Organization

Principle 2: *The Importance of Redundancy*
- In information processing
- In skills and the design of work

Principle 4: *"Minimum Specs"*
- Define no more than is absolutely necessary

Principle 3: *Requisite Variety*
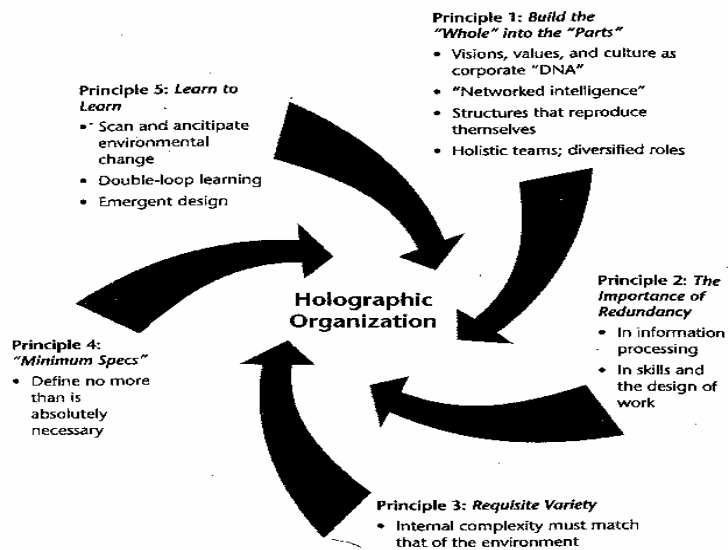- Internal complexity must match that of the environment

Exhibit 4.4. Principles of holographic design

Principle 1: Build the "whole" into all the "parts"

This principle seems to express an impossible ideal. But there are at least four ways in which the "whole in parts" philosophy can be realized in practice: by focusing on corporate culture, information systems, structure, and roles.

1. *Corporate DNA.* The visions, values, and sense of purpose that bind an organization together can be used as a way of helping every indi-

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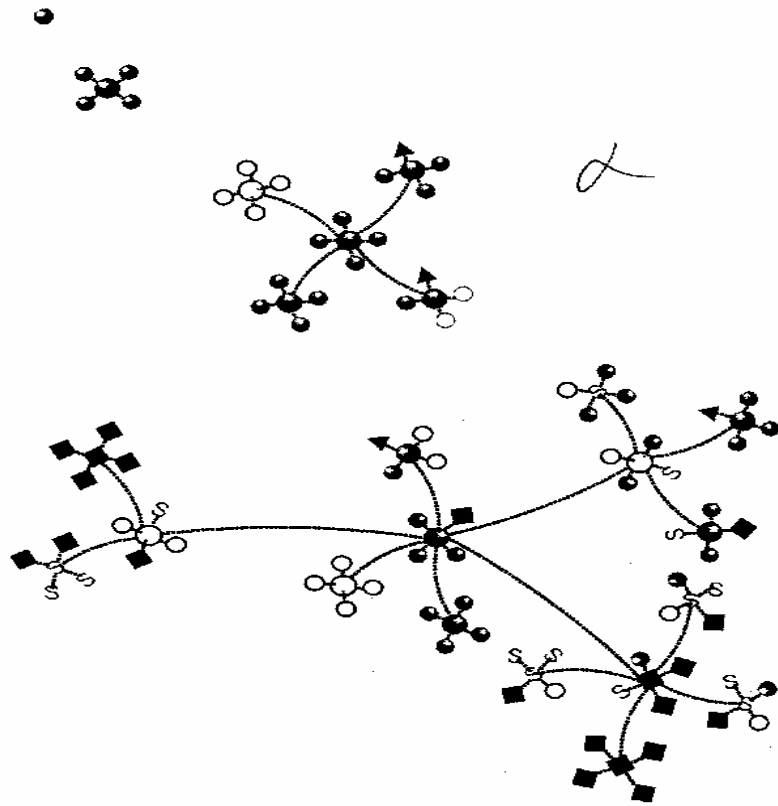This "whole in parts" principle does not always result in "clones."

Exhibit 4.6. Holographic yet differentiated

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