Modeling the Learning Process

4 Basic Functions the Brain Uses for Learning

• Getting Information
• Making Meaning of Information
• Creating New Ideas
• Acting on Those Ideas
Learner Begins as Receiver of Knowledge
Gathering
Information Enters through Senses

Can you remember four things that influence this gathering?

- Interest
- Intent
- Basic Background (prior knowledge)
- Understanding
Gathering takes place in the sensory cortex
Critical Thinking

Gathering

• You discovered:
• The steps of the decision making process
• Levels of Blooms Taxonomy
• What else?
Analyzing to Make Meaning

REFLECTION

• Try to make personal
• Try to determine connection to past experiences
• Try to discover relevance and usefulness
• Try to discover what it's like that we already know.
Analyzing takes place in the Back Integrative cortex
Critical Thinking
Analyzing

You analyzed your use of time

– *How?*

– You analyzed options in decisions you need to make

– You analyzed and found examples of levels of Bloom’s Taxonomy to make sure you understood them.
Creating
Convert comprehension to

• Ideas
• Hypothesis
• Plans
Critical Thinking
Creating

• You created a
• Plan for making decisions
• Predicted Test Questions at each level of Bloom.
Creating Takes Place in the front integrative cortex
Acting Testing Ideas

- Writing
- Speaking
- Drawing
- Can you think of other ways?
Acting Takes Place in the Motor Cortex
Critical Thinking
Acting

• You tested your Decision Making plan by following it.

• The practiced answering the questions you predicted and found examples on tests
Learner becomes *Producer* of Knowledge