Kolb’s Learning Theory

Kolb (1984) offers an experiential learning cycle, based on the learning models of Lewin, Dewey and Piaget.

The core of Kolb’s four-stage model is a simple description of the learning cycle which shows how experience is translated through reflection into concepts, which in turn are used as guides for active experimentation and the choice of new experiences. Kolb refers to these four stages as: concrete experience (CE), reflective observation (RO), abstract conceptualization (AC) and active experimentation (AE). They follow each other in a cycle.

Concrete Experience: Where the learner is actively experiencing an activity (e.g. a laboratory session, field class)
Reflective Observation: Where the learner is consciously reflecting back on that experience
Abstract Conceptualisation: Where the learner is being presented with/for trying to conceptualise a theory or model or what is (to be) observed
Active Experimentation: Where the learner is trying to plan how to test a model or theory or plan for a forthcoming experience

Source: Based on Jenkins (1990, 43)

The cycle may be entered at any point, but the stages should be followed in sequence. The learning cycle thus provides feedback, which is the basis for new action and evaluation of the consequences of that action. Learners should go through the cycle several times, so it may best be thought of as a spiral of cycles. In brief Kolb conceptualizes the process of action research as "a spiral of action and research consisting of four major moments: plan, act, observe and reflect " (Zuber-Skerritt 1992b, 11). Race (1993) has proposed a variant on Kolb’s model also using more everyday language. He refers to the stages as: wanting, doing, feedback and digesting.

As its name indicates, the ‘experiential learning theory’ affirms the importance of experiential activities such as fieldwork and laboratory sessions, however it does not prioritise those forms of learning. What is important is to systematically take the learner around each stage of the cycle, ensuring that effective links are made between each stage.
The model offers an explicit critique of those highly theoretical programmes or courses that do not value the prior experience or knowledge of students. It is similarly critical of those experiential activities (for example, certain field courses, simulations and games) where students receive little preparation for the experience and/or no effective chance to reflect upon the experience and relate it to their wider reading or the more explicitly theoretical aspects of the course (Jenkins 1997).

There are two primary axes that lie behind the cycle: an 'abstract-concrete' dimension (AC-CE) and an 'active-reflective' (AE-RO) dimension. These reflect the two main dimensions to the learning process which correspond to the two major different ways by which we learn: the first is how we perceive or grasp new information or experience, and the second is how we process or transform what we perceive (Smith and Kolb 1986). The way we perceive or grasp experience ranges from immersing ourselves in the experience using our senses and feelings in a 'concrete' way to thinking 'abstractly' using logic and reason. Having perceived the experience we need to understand it through transforming it. Here individuals differ in their predilection for doing (active experimentation) and watching (reflective observation) (Fielding 1994). When plotted graphically at right angles the two axes give four different clusters, which may be used both to describe the preferred learning styles of students and to identify disciplinary groupings.

Kolb (1984) suggests that students develop a preference for learning in a particular way. The preferred style reflects a tendency rather than an absolute and students may adopt different learning styles in different situations, but they tend to favour some learning behaviours in Greater Expectations, Smart Business Coaching Course, Session 4 Optional Material  Page 2
preference to others. He identifies four learning styles, each of which is associated with a different way of solving problems:

1. **Divergers** - view situations from many perspectives and rely heavily upon brainstorming and generation of ideas.

2. **Assimilators** - use inductive reasoning and have the ability to create theoretical models.

3. **Convergers** - rely heavily on hypothetical-deductive reasoning.

4. **Accommodators** - carry out plans and experiments and adapt to immediate circumstances.

The particular choice of learning style reflects the individual's abilities, environment and learning history (Nulty and Barrett 1996). According to Kolb, learners learn better when the subject matter is presented in a style consistent with their preferred learning style:

<table>
<thead>
<tr>
<th>Learning style</th>
<th>Conditions under which learners learn better</th>
</tr>
</thead>
<tbody>
<tr>
<td>Assimilators</td>
<td>When presented with sound logical theories to consider</td>
</tr>
<tr>
<td>Convergers</td>
<td>When provided with practical applications of concepts and theories</td>
</tr>
<tr>
<td>Accommodators</td>
<td>When allowed to gain 'hands on' experience</td>
</tr>
<tr>
<td>Divergers</td>
<td>When allowed to observe and gather a wide range of information</td>
</tr>
</tbody>
</table>

Left to their own devices students tend to do what is easiest for them, which is to use their own learning style. Similarly individual teachers may teach in ways that reflect their own learning styles and implicitly assume that all their students learn that way. However, there is evidence that learning (or at least retention) is enhanced as more of the learning stages are used (Stice 1987). This confirms Kolb's argument that teachers need to encourage students to engage with all four stages of the learning cycle. Indeed Kolb (1984) suggests that there are potential long term benefits where there is an intentional mismatch between learning style and instructional style on the grounds that:

"The aim is to make the student self-renewing and self-directed; to focus on integrative development where the person is highly developed in each of the four learning modes; active, reflective, abstract and concrete. Here, the student is taught to experience the tension and conflict among these orientations, for it is from these tensions that creativity springs."

Kolb’s model has been used regularly since it was introduced and has led to the development of further models such as Honey & Mumford’s LSQ, who suggest a four-phase cycle of learning, and four modes of learning, characterised here by the terms activists, reflectors, theorists and pragmatists.

We each have our individual learning styles, made up a mix of the above four modes. The dividing line in the diagram indicates firstly the AC-CE balance (how much more inclined a learner is towards the abstract rather than concrete) and secondly the AE-RO balance (how much the learner is inclined towards active experimentation rather than reflective behaviour).

Kolb et al stress that these exercises are not intended to be definitive, that each person's style is not necessarily fixed, and that in using them we should avoid the danger of stereotyping ourselves or others.

Sources:
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