Psikologi Pendidikan

Runi Rulanggi-FHB UPJ

NEXT

Education is the most powerful weapon which you can use to change the world.

–Nelson Mandela–

NEXT

Selamat datang

Di Kelas Psikologi Pendidikan

NEXT

RENCANA, INSTRUKSI DAN TEKNOLOGI PEMBELAJARAN

NEXT

OUTLINE

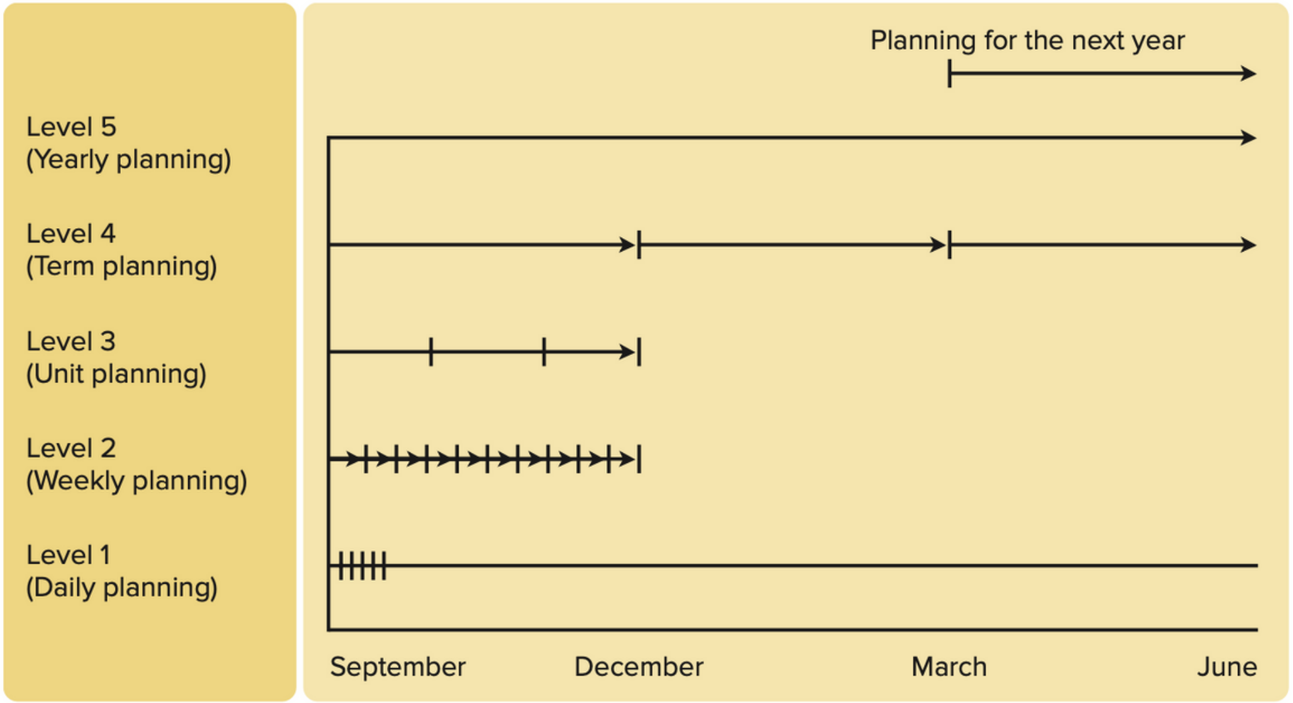
- Rencana Pembelajaran
- Perencanaan dan Instruksi Pembelajaran Berpusat Guru
- Perencanaan dan Instruksi Pembelajaran Berpusat Siswa
- Teknologi dan Pendidikan

INSTRUCTIONAL PLANNING

- Pengembangan strategi pembelajaran secara sistematis dan terorganisasi.
- 4 strategi pembelajaran : materi pembelajaran, siswa, konteks pembelajaran dan peran guru
- Membuat target (waktu) dan perencanaan

FIGURE 1 FIVE TIME SPANS OF TEACHING PLANNING AND THEIR OCCURRENCE OVER THE SCHOOL YEAR

Source: From R. J. Yinger, "A Study of Teacher Planning," *The Elementary School Journal,* Vol. 80, No. 3 (Jan. 1980), p. 113. Copyright © 1980 by The University of Chicago. Reprinted by permission of the University of Chicago Press.



PERENCANAAN DAN INSTRUKSI PEMBELAJARAN BERPUSAT GURU

- Pembelajaran berpusat guru
- Tujuan pembelajaran
  - Mengubah perilaku siswa
  - Kondisi yang dapat mempengaruhi munculnya perilaku siswa
  - Kriteria capaian pembelajaran
- Task analysis –> memecah tujuan pembelajaran yang kompleks ke dalam beberapa capaian komponen yang lebih sederhana. 3 konsep dasar dalam task analysis :
  - 1. konsep atau capaian pembelajaran yang harus dikuasai siswa
  - 2. Alat dan bahan yang dibutuhkan untuk menunjang proses pembelajaran
  - 3. Daftar komponen pembelajaran yang perlu dikuasai (secara urut) oleh siswa

Instructional Taxonomies

- Taksonomi Bloom :
- Kognitif, afektif dan psikomotorik
- Kognitif :
  - Knowledge
  - Comprehension
  - Application
  - Analysis
  - Synthesis
  - Evaluation
- Afektif :
  - Receiving
  - Responding
  - Valuing
  - Organizing
  - Value characterizing

Instructional Taxonomies

- Taksonomi Bloom :
- Psikomotorik
  - Reflex movements
  - Basic fundamentals
  - Perceptual abilities
  - Physical abilities
  - Skilled movements
  - Nondiscursive behaviors

INSTRUCTIONAL TAXONOMIES (TERBARU)

- 4 dimensi pengetahuan, dari yang conkrit (factual) hinge abstract (metakognisi), yakni :
  - Factual : komponen dasar yang harus dimiliki siswa untuk menyelesaikan sebuah tugas atau permasalahan
  - Konseptual : interrelasi antara komponen dasar dan struktur yang lebih besar –> bersama–sama membentuk fungsi tertentu
  - Prosedural : proses, pendalaman dan kriteria yang diperlukan untuk menerapkan keterampilan tertentu
  - metakognisi : gambaran konsep, kesadaran seseorang

DIRECT INSTRUCTION

- Direct instruction
- Instruksi langsung bersifat terstruktur, yang ditandai dengan adanya arahan dan kontrol dari guru, ekspektasi yang tinggi terhadap siswa, lebih banyak waktu yang digunakan siswa untuk mengerjakan tugas dan usaha yang dilakukan oleh guru untuk menimalisasi dampak negatif dari proses pembelajaran.

NEXT

TEACHER-CENTERED INSTRUCTIONAL STRATEGIES

- Orienting
- Lecturing, Explaining, and Demonstrating
- Questioning and Discussing
- Mastery Learning
- Seatwork
- Homework

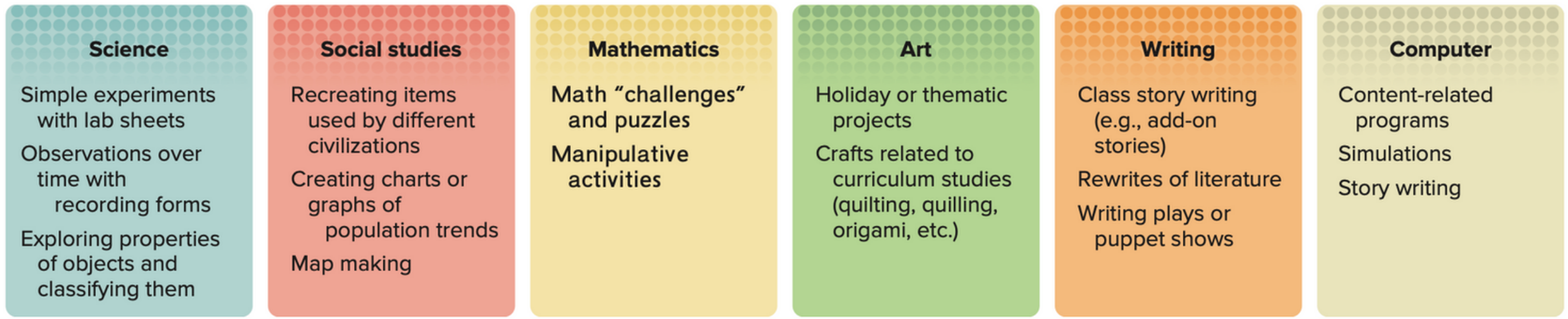


FIGURE 3 SUGGESTIONS FOR LEARNING CENTERS

EVALUATING TEACHER-CENTERED INSTRUCTION

- perencanaan tujuan yang jelas, tenggat waktu penyelesaian tugas yang relevan
- ekspektasi tinggi terhadap progres siswa dan evaluasi waktu belajar siswa
- menjelaskan dan mendemonstrasikan aspek pembelajaran
- menjaga minat belajar siswa dengan mengembangkan keterampilan bertanya kritis
- instruksi individual atau dalam kelompok kecil
- memberikan PR yang dapat membantu siswa untuk meningkatkan performa pembelajaran merek

NEXT

PEMBELAJARAN BERPUSAT PADA SISWA

Cognitive and Metacognitive Factors

1. Nature of the learning process
   The learning of complex subject matter is most effective when it is an intentional process of constructing meaning from information and experience.
2. Goals of the learning process
   The successful learner, over time and with support and instructional guidance, can create meaningful, coherent representations of knowledge.
3. Construction of knowledge
   The successful learner can link new information with existing knowledge in meaningful ways.
4. Strategic thinking
   The successful learner can create a repertoire of thinking and reasoning strategies to achieve complex goals.
5. Thinking about thinking
   Higher-order strategies for selecting and monitoring mental operations facilitate creative and critical thinking.
6. Context of learning
   Learning is influenced by environmental factors, including culture, technology, and instructional practices.

Motivational and Instructional Factors

7. Motivational and emotional influences on learning
   What and how much is learned is influenced by the learner's motivation. Motivation to learn, in turn, is influenced by the learner's emotional states, beliefs, interests, goals, and habits of thinking.
8. Intrinsic motivation to learn
   The learner's creativity, higher-order thinking, and natural curiosity all contribute to motivation to learn. Intrinsic motivation is stimulated by tasks of optimal novelty and difficulty, relevant to personal interests and providing for personal choice and control.
9. Effects of motivation on effort
   Acquisition of complex knowledge and skills requires extended learner effort and guided practice. Without learners' motivation to learn, the willingness to exert this effort is unlikely without coercion.

Developmental and Social Factors

10. Developmental influences on learning
    As individuals develop, there are different opportunities and constraints for learning. Learning is most effective when development within and across physical, cognitive, and socioemotional domains is taken into account.
11. Social influences on learning
    Learning is influenced by social interactions, interpersonal relations, and communication with others.

Individual Difference Factors

12. Individual differences in learning
    Learners have different strategies, approaches, and capabilities for learning that are a function of prior experience and heredity.
13. Learning and diversity
    Learning is most effective when differences in learners' linguistic, cultural, and social backgrounds are taken into account.
14. Standards and assessment
    Setting appropriately high and challenging standards and assessing the learner as well as learning progress—including diagnostic, process, and outcome assessment—are integral parts of the learning process.

FIGURE 4 LEARNER-CENTERED PSYCHOLOGICAL PRINCIPLES

NEXT

STAD (Student-Teams-Achievement Divisions)

STAD involves team recognition and group responsibility for learning in mixed-ability groups (Slavin, 1995). Rewards are given to teams whose members improve the most over their past performances. Students are assigned to teams of four or five members. The teacher presents a lesson, usually over one or two class periods. Next, students study worksheets based on material presented by the teacher. Students monitor their team members' performance to ensure that all members have mastered their material.

Teams practice working on problems together and study together, but the members take quizzes individually. The resulting individual scores contribute to the team's overall score. An individual's contribution to the team score is based on that individual's improvement, not on an absolute score, which motivates students to work hard because each contribution counts. In some STAD classrooms, a weekly class newsletter is published that recognizes both team and individual performances.

The STAD approach has been used in a variety of subjects (including math, reading, and social studies) and with students at different grade levels. It is most effective for learning situations that involve well-defined objectives or problems with specific answers or solutions. These include math computation, language use, geography skills, and science facts.

The Jigsaw Classroom

In the chapter on sociocultural diversity, we described the jigsaw classroom, which involves having students from different cultural backgrounds cooperate by doing different parts of a project to reach a common goal. Here we elaborate on the concept.

Developed by Elliot Aronson and his colleagues (1978), *jigsaw I* is a co-operative learning approach in which six-member teams work on material that has been broken down into parts. Each team member is responsible for a part. Members of different teams who have studied the same part convene, discuss their part, and then return to their teams, where they take turns teaching their part to other team members.

Robert Slavin (1995) created *jigsaw II,* a modified version of *jigsaw I*. Whereas *jigsaw I* consists of teams of six, *jigsaw II* usually has teams of four or five. All team members study the entire lesson rather than one part, and individual scores are combined to form an overall team score, as in STAD. After they have studied the entire lesson, students become expert on one aspect of the lesson; then students with the same topics meet in expert groups to discuss them. Subsequently, they return to their teams and help other members of the team learn the material.

Learning Together

Created by David and Roger Johnson (1994), this approach has four components: (1) face-to-face interaction, (2) positive interdependence, (3) individual accountability, and (4) development of interpersonal group skills. Thus, in addition to Slavin's interest in achievement, the Johnsons' cooperative learning approach also focuses on socioemotional development and group interaction. In learning together, students work in four- or five-member heterogeneous groups on tasks with an emphasis on discussion and team building (Johnson & Johnson, 2009).

Group Investigation

Developed by Shlomo Sharan (1990; Sharan & Sharan, 1992), this approach involves a combination of independent learning and group work in two- to six-member groups, as well as a group reward for individual achievement. The teacher chooses a problem for the class to study, but students decide what they want to study in exploring the problem. The work is divided among the group's members, who work individually. Then the group gets together, integrating, summarizing, and presenting the findings as a group project. The teacher's role is to facilitate investigation and maintain cooperative effort. Students collaborate with the teacher to evaluate their effort. In Sharan's view, this is the way many real-world problems are solved in communities around the world.

Cooperative Scripting

Students work in reciprocal pairs, taking turns summarizing information and orally presenting it to each other (Dansereau, 1988; McDonald and others, 1985). One member of the pair presents the material. The other member listens, monitors the presentation for any mistakes, and gives feedback. Then the partner becomes the teacher and presents the next set of material while the first member listens and evaluates it.

FIGURE 1 COOPERATIVE LEARNING APPROACHES

NEXT

Strategi pembelajaran berpusat pada siswa :

- Problem-Based Learning
- Essential Questions
- Discovery Learning

TECHNOLOGY AND EDUCATION

- The Internet
  - Navigating and integrating knowledge
  - Collaborative learning
  - Computer-mediated communications (CMC)
  - Improving teachers' knowledge and understanding
- Graphics and Presentation

STANDARDS FOR TECHNOLOGY- LITERATE STUDENTS

- Empowered Learner. Students actively use technology to reach learning goals.
- Digital Citizen. Students demonstrate responsibility and are ethical in their use of technology.
- Knowledge Constructor. Students use a variety of resources and digital tools to construct knowledge, become more cre- ative, and engage in meaningful learning.
- Innovative Designer. Students use various technologies to solve problems and craft useful and imaginative solutions to these problems.
- Computational Thinker. Students develop strategies in using technology to create solutions and test them.
- Creative Communicator. Students communicate effectively and think creatively in their use of digital tools to attain goals.
- Global Collaborator. Students use technology to widen their perspectives and enhance their learning by connecting with others locally and globally.

NEXT

TEACHING, LEARNING, AND TECHNOLOGY

- Using Technology to Improve Students' Understanding
- Technological Pedagogical Content Knowledge (TPCK): inks between technology, content knowledge, and pedagogy
- Stages of Integrating Technology into Classroom Teaching Integrating technol- ogy into your classroom teaching often takes place in the following sequence (Norris & Soloway, 1999):
  - Stage 1: Teacher is aware that a particular technology exists but hasn't used it; may be avoiding the technology.
  - Stage 2: Teacher is currently trying to learn the basic aspects of the technol- ogy but often becomes frustrated and still lacks confidence with this technology.
  - Stage 3: Teacher is beginning to see how to use a particular technology and thinks about specific situations in which to use it.
  - Stage 4: Teacher is gaining confidence in using the technology for certain tasks and feeling more comfortable in using it.
  - Stage 5: Teacher now thinks about this technology as something that helps him or her and no longer lacks confidence in using it; teacher perceives that the technology can be used in a number of instructional contexts.
  - Stage 6: Teacher can use this technology as an effective instructional tool across the curriculum to meet instructional objectives.

Referensi :

Santrock, J. W. (2018). Educational Psychology 6th Edition. New York: McGraw-Hill.