

A Journey towards the Commitments of National Education Policy 2020 through Concept Mapping

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Abstract: *Objectives: To explore education goals and issues in National Education Policy (NEP 2020), Ministry of Human Resource Development, and Government of Asian nation. this review tries to search out some ways that and ways to form learning method pleasant and meaty as desired by NEP 2020. The roles of construct mapping in achieving the education goals of NEP 2020, conjointly objectify this paper. Method/Analysis: In following the objectives, NEP 2020 and a collection of articles associated with the subject were explored. This study provides an assessment and review on the role of construct mapping in achieving the education goals of NEP 2020. The paper deals with the common issues of NEP2020 and construct Mapping. Findings: the end result of the review is that idea mapping offers an efficient tool in education for each, teaching and learning method by supporting a lively and meaty learning. construct maps offer a novel graphical read of however students organize, connect, and synthesize data. construct maps offer students a chance to consider the connections between the ideas being learnt and mirror on their understanding of the construct that develops crucial thinking of the learners. Further, it provides platform for collaboration, discussion; incoming at shared understandings among members of teams. Construct map is wont to replace memorisation with meaty and pleasant learning. Novelty: NEP 2020 has been explored and brought into thought keenly to search out its education goals. The role of construct mapping in achieving education goals of NEP 2020 has been highlighted within the gift paper. Thus, the paper explores however construct mapping is an efficient tool in conducive to an excellent extent to fulfil the education goals of NEP 2020.*

Keywords: National Education Policy 2020; Pedagogy; crucial Thinking; construct Mapping.

I. INTRODUCTION

“Education is prime for achieving full human potential, developing Associate in Nursing just & simply society, thus; promoting national development. Providing universal access to Quality education is that the key to India’s continuing ascent, and leadership on the world stage in terms of economic process, social justice and equality, scientific advancement, national integration and cultural preservation. Universal high-quality education is that the best approach forward for developing and increasing our country’s made abilities and resources for the nice of the individual, the society, the country and therefore the world.” (1) In the introduction section of the National Education Policy 2020, its vision and objectives of education square measure clearly explicit that reflects the importance of thought mapping and developing crucial thinking within the learners nowadays. Additional the document says, “Pedagogy should evolve to form education additional experiential, holistic, integrated, inquiry-driven, discovery-oriented, learner-cantered, discussion-based, flexible, and, of course, enjoyable” (NEP2020)(1). Here, it suggests and proposes as however education ought to be imparted. this paper enquires into varied researches and world experiences referring to thought maps and cooperative thought mapping. The paper tries to justify thought maps and cooperative thought mapping as a tool to contribute to fulfil the tutorial mission and wishes of NEP 2020.

II. PEDAGOGICAL GOALS IN NEP 2020

Under Heading four, titled- “Curriculum and Pedagogy in Schools: Learning ought to be holistic, Integrated, Enjoyable, and Engaging” the Policy document in sub points- four.2, 4.4, and 4.5, directs some bound pedagogic issues which may be placed within the following heads :

1. Discussion of the additional abstract ideas in every subject.
2. Explorations of relations among totally different subjects.
3. Experiential learning inside every subject.
4. Learning the way to learn.
5. Education faraway from the culture of rote as is essentially gift nowadays.
6. Development of crucial thinking.
7. The content can specialize in key ideas.
8. Discussion-based learning.
9. Input of cooperative activities for deeper learning.
10. In the literary criticism on NEP 2020, Panditrao and Panditrao(2)found that there's a stress on abstract understanding, power and significant thinking to encourage logical decision-making and innovation instead of rote and learning for examinations.

2.1 Prevalence of the Culture of memorization Learning: A Key Concern of NEP 2020

The National Education Policy 2020 states clearly the rife culture of rote gift in education system until these days. This one truth hinders in achieving all alternative pedagogic goals resulting in issues moon-faced by learners in their holistic development. If there's prevalence of rote, there can't be effective experiential learning, nor there may be a scope of crucial thinking among the scholars. The research worker additionally enquired and located an equivalent. Following is that the elaboration of however the research worker came to understand of the actual fact of rote through personal experiences and scientific investigation. varied literature reviews advocate meaty learning for quality education and opposed rote. A survey conducted by the Hindu reveals that rote is rife in high faculties too. (3) in keeping with Catherin 2018, rote these days could be a staple in faculties across the country. Not simply lecturers however even folks, realize themselves voice communication “mug up and you’ll pass” to assist their youngsters build it through their exams. (4)There area unit numerous alternative evidences that indicate towards rote. In many colleges, answers area unit ticked by teacher, derived and to be learned because it is by students. Such practices encourage rote and discourage expressive style as they need to repeat from book or compose the prescribed answers. Learning answers “as it is” with none understanding provides less scope of power and expressive style. The research worker additionally asked the subsequent set of 2 queries from sixty students together with some faculty students too. The queries asked area unit as follows:

1. The length of a keypad is around:
 - a. twelve meter
 - b. fourteen meter
 - c. one Meter
 - d. 1.5 Meter
2. That of the subsequent on the planet cannot get vertical rays from the sun?
 - a. 0olatitude
 - b. 15o N latitude
 - c. twenty three 12oS latitude
 - d. 25o N latitude

It was amazingly determined that solely twenty seven students out of sixty answered the primary question properly whereas second question was answered properly solely by twelve students. In alternative words, thirty three students in initial question and forty eight students in second question didn't provide correct answers. These 2 queries should be answered simply by any student United Nations agency passed category VI. National information Framework (NCF 2005) Developed by the National Council for instructional analysis and coaching, the NCF powerfully advocated a move far from rote and toward additional kid focused practices. (5)

It may be all over from the on top of observation that rote isn't a follow adopted by one or 2 schools; it's rather a trend, a haul prevailing in Indian education system.

2.2 Idea Mapping

A concept map (CM) is just a form of diagram that displays the relationships between ideas. The thought was originally developed by Joseph Novak within the Nineteen Seventies. It's a schematic device for representing a collection of ideas that means embedded during a framework of propositions. (6) These square measure graphical tools for organizing and representing data during a logical sequence. An idea Map's structure looks to be a mental presentation of data, that Collins and Quillian (1972) (7) labelled "Semantic Memory". CM could facilitate a learner to learn a selected content during a meaty manner and conjointly to push, additional nonchalantly, relevant reading comprehension skills. They're in the main created from the subsequent constituents:

A. Concept

A concept will be outlined as a perceived regularity (or pattern) in events or objects, or records of events or objects, selected by label. Ideas square measure typically embowered in a circle or boxes of some kind.

B. Linking Words

Words on the road, remarked as linking words or linking phrases, specifying the link between the 2 ideas.

C. Proposition

According to Oxford advanced learner's wordbook of current English, "Proposition could be a statement that expresses AN opinion." Propositions square measure statements concerning some object or event within the universe, either present or created. Propositions contain 2 or additional ideas connected mistreatment linking words or phrases to make a meaty statement. These connected terms will be scan as a sentence, like "India has democracy." "These sentences—two terms connected by AN arrow and phrase—are known as propositions.

III. COLLABORATIVE IDEA MAPPING

Collaborative idea mapping engages 2 or additional students in coordinated and sustained efforts within the creation of 1 or additional idea maps so as to find out and construct data. It's a doubtless powerful educational strategy that fosters meaty learning and cluster data construction that any helps the building of ground among learners. This inter-learner interaction" will foster learning through student collaboration and data sharing. Learner interaction will considerably encourage the event of student experience in several subject areas and promote community building.

According to some researchers cooperative learning is that the task-focused interaction among students that enhances learning by making conflicts, by exposing students to higher levels of thinking, and interesting them in higher level interaction. (10) Collaborative idea mapping provides for college students the flexibility to externalize internal thoughts, whereas collaborating could be a venue for exploring and discussing such externalizations. It's been recommended by Daley, Darning and Torre (11) in their study that the teacher will raise totally different teams of scholars to form a map so raise every cluster to share their map with another cluster of scholars. The teacher will then value potential changes in maps created by one cluster compared the other group's map. Cluster map sharing permits the individual students and also the cluster as an entire to look at the work of alternative students, discover totally different approaches and procure input whereas perpetually learning from one another.

3.1 Role of idea mapping in achieving education goals of NEP 2020

There square measure bound education considerations in NEP 2020 such as-Discussion upon abstract ideas of every subject, experiential learning at intervals every subject, education aloof from the culture of memorisation, discussion-based learning, input of cooperative activities for deeper learning etc. Idea mapping as a tool will facilitate to an excellent extent in achieving such goals.

Concept map as a education and assessment tool in Education could provide an efficient tool for teaching-learning method in an efficient manner. Idea maps give a singular graphical read of however students organize, connect, and synthesize info. As a result, idea mapping proves to be useful for each, students and academics. Idea maps provide students a chance to rely on the connections between the ideas being learnt, organize their thoughts and visualize the

relationships between key ideas in an exceedingly systematic approach, and square measure able to mirror on their understanding. The results of the study done by Sharma, and Singh,(12)evidently proven that accomplishment in social science of the cluster exposed to cooperative idea mapping strategy was considerably over compared to cluster tutored by typical technique. The study done by Tyagi and Pandey(13)indicated a big impact of cooperative idea Mapping on students’ understanding of ideas in scientific discipline.

To sum up, idea maps enable students to suppose deeply regarding their learning by serving to them to raised perceive and organize what they learn, to store and retrieve info a lot of expeditiously. Students conjointly articulate and challenge their thoughts after they discuss their maps with one another. idea maps also are valuable tools for academics as a result of they supply info regarding students’ understanding. academics will examine however well a student understands subject by perceptive the sophistication of their idea map. academics will quickly see gaps in learning and modify lesson plans supported the data from students’ idea maps.

3.2 Effectiveness of Construct Mapping

Sharma & Elbow observe that Students unit frequently conditioned in their approach to learning by experiences in teacher centered, textbook-driven college rooms. This case might be a distressing case for up thus far educators, and for this reason they may rather choose the most recent models and ways in which unit less complicated in directional students to thinking. Ghazivakili et al.(15)investigated that crucial thinking happens once students interact in analyzing, evaluating, deciphering, or synthesizing data And applying creative thought to form Associate in Nursing argument, solve a drag, or reach a conclusion. Several studies show that the employment of construct mapping in teaching learning technique lays positive result. Eachempati et al. found that after construct mapping is used as teaching tool; it's positive result on the students and helps to beat the students adopting ancient approach. In his study Ahuja also everywhere that concept mapping aims at the teaching and learning of concepts at “understanding level” during a very meaty manner. it had been in addition supported by Sivaraman World Health Organization found that concept mapping may be a sensible teaching-learning technique in chemistry than the regular lecture classes.

Since their development, construct maps area unit wide used for many functions and in varied utterly completely different contexts. Construct maps have in addition been useful for:

1. Providing a define of a person’s existing knowledge
2. Characteristic misconceptions
3. Revealing gaps in understanding
4. Promoting reflective thinking
5. Designing curricula and tutorial materials
6. Assessing students’ learning
7. Evaluating program effectiveness
8. Facilitating communication and inward at shared understanding among members of groups

3.3 Relationship between NEP 2020 and Construct Mapping

The figure presents common problems with NEP2020 and construct mapping. the upper oval represents NEP 2020 partially; whereas the lower oval represents construct mapping with its rich contribution in terms of: cooperative learning, gratifying learning, clarity of concepts, meaty learning and hard-to-please thinking. The crossed area that's common to every the ovals; represents the association between NEP2020 and construct mapping.



Figure 1: NEP2020 and Concept mapping

IV. RECOMMENDATIONS

Based on the findings of the study, the following recommendations are made:

1. Pre-service teachers and in-service teachers should be given training as how to use concept mapping and collaborative concept mapping effectively in the teaching learning process.
2. All teachers should use concept mapping or collaborative concept mapping in some way or the other because they have been found an effective tool for meaningful learning.
3. Concept mapping must be given space in all the text books wherever possible. Such exposure through text books will lead students towards key concepts of the topics and better understanding.
4. Collaborative concept mapping should be used for the development of discussion-based learning. 5. Information and communication technology (ICT) should be used for online concept mapping and collaborative concept mapping.

V. CONCLUSION

National Education Policy 2020 observes the culture of committal to memory for the most part used until nowadays. The policy, NEP2020, so expresses sure considerations and goals relating pedagogy. On the idea of this review, it may be aforesaid that idea mapping as a method will contribute to a good extent to satisfy the tutorial mission and wishes of NEP 2020. Thus, conception mapping might provide an efficient tool in education for each teaching and learning by supporting an energetic and significant learning.

REFERENCES

- [1]. National Education Policy 2020. 2020. Available from: https://www.education.gov.in/sites/upload_files/mhrd/files/NEP_Final_English_0.pdf.
- [2]. Panditrao MM, Panditrao MM. National Education Policy 2020: What is in it for a student, a parent, a teacher, or us, as a Higher Education Institution/University? *Adesh University Journal of Medical Sciences & Research*. 2020;2(2):70–79. Available from: https://dx.doi.org/10.25259/aujmsr_32_2020.
- [3]. Venkataramanan K. Learning by rote prevalent in top schools too . 2016. Available from: <https://www.thehindu.com/opinion/op-ed/learning-by-roteprevalent-in-top-schools-too/article2707183.ece>.
- [4]. Catherin A. English Rote Learning; An Introspection, *New Perspectives in ELT*. vol. 18. 2018;p. 13–16. Available from: <http://www.languageinindia.com/april2018/theniseminar2/theniseminar2018volume.pdf>.
- [5]. National Council of Educational Research and Training. 2005.