THEORETICAL EXTENSION OF THE NEW EDUCATION POLICY 2020 USING TWITTER MINING

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ABSTRACT

In 2015, India adopted the UN's Agenda for Sustainable Development Goal 4 which aims to "ensure inclusive and equitable quality education and promote lifelong learning opportunities for all". As the existent educational system was inadequate to meet the desired sustainable goal, the Indian government introduced the New Education Policy (NEP) in 2020. Considered as an inclusive education policy that focuses on fostering knowledge and value-based education, this study aims to evaluate the paradigm of NEP in the higher education sector. The study collected data from official policy documents (from the Ministry of Human Resource Development website) and Twitter to explore the critical areas in the NEP. By adopting the qualitative analysis method, the data were analysed using computer-assisted qualitative data analysis software. After mining the data from tweets and policy documents, sentiment analysis and other forms of graphical representations were conducted. The study identified three themes namely students, language and discipline. The sentiment analysis revealed that the majority of the people were optimistic about the implementation of the NEP in the higher education sector. The study suggests practical implications for the higher educational institutes (HEIs), teachers and researchers.

Keywords: Qualitative analysis, New Education Policy (NEP), Sentiment Analysis, Twitter Mining, MAXQDA, India

Introduction and Literature Review

Countries develop their education systems to progress further and bring societal advancement (Rizvi & Lingard, 2009). To promote inclusive and equitable educational system in the country, India's Government (GoI) devised the National Policy on Education (NPE) in 2020 (Kaurav, Suresh, Narula, & Baber, 2020). The fundamental goal of imparting education is to enable individuals to realize their full human potential. It further creates a society of equal opportunities for everyone and subsequently promote national growth. Thus, universal education is the key to India's continued ascension, and bringing social justice, and national integration in the longer run. High-quality of educational infrastructure, easy access to schools and colleges, and flexibility in meeting the needs of students would create an unprecedented path toward excellence. This would further advance and optimize the skills of human resources in India, and generate socio-economic benefits for individuals, community, the nation, and even to the world. As India's young population is expected to rise constantly in the coming decade, the quality of its educational system will determine the country's destiny.

We're in the world of a tremendous transformation in the terrain of information. Computers and software will replace certain tasks currently done by humans, such as truck driving and bar tending, while the need for workers skilled in mathematics, computer science, and data science will increase in conjunction with multidisciplinary abilities in multiple fields, such as the sciences, social sciences, and humanities. People who require more training to tackle the challenges of climate change, increased pollution, and decreasing natural resources include those in biology, chemistry, physics, agriculture, climate science,

and social science. The increased emergence of crises (COVID-19, MERS, SARS, Tsunamis etc.) further alerts the need for multidisciplinary and interdisciplinary learning (Wen et al., 2020). As India transitions into a developed country and ranks among the three most important economies in the world, the demand for humanities and the arts will increase.

The Indian national government's declaration of its commitment to making universal education and lifelong learning available to all citizens by the year 2030 was manifested in Goal 4 of the Sustainable Development Goals, enacted in 2015. Changing the educational system so that all of the 2030 Agenda's targets and goals can be reached will be a difficult task, but is an extremely worthwhile education. Moreover, as India aims to become a trillion-dollar economy by 2030-2032, concrete foundation in building human resources is a prerequisite. Bilateral focus on economic growth and promoting of the knowledge economy would help India achieve its objective of becoming the third largest economy in a decade. The introduction of the NEP is considered to transform the Indian conventional practices in the education system. It aims at imparting quality education at all economic levels and developing a knowledge based educational system (NEP, 2020).

India's new education system is outlined in the National Education Policy (NEP, 2020), which was adopted by the Union Cabinet on July 29th, 2020. The new education policy supersedes the earlier National Policy on Education, which was instituted in 1986. The framework includes educational guidance and assistance for early schooling through secondary school, as well as instruction in advanced vocational training in both rural and urban India. The aim of the school reform plan is to revolutionise India's education system by 2021.

It's become more important than ever that students learn, but also learn how to learn as their profession rapidly changes and the global ecosystem evolves. Less is more when it comes to education. School subjects must transition from emphasising content to emphasising learning about new thinking, problem solving, creativity, and innovation. Educational pedagogy must continue to adapt to meet educational objectives like increased experiential learning, holistic education, integration, inquiry-based instruction, student-centred learning, and

flexible learning. In addition to science and mathematics, the curriculum must include arts, crafts, humanities, games, sports, fitness, languages, literature, culture, and values, in order to help students to develop all of their capabilities and achieve a well-rounded education. An education that makes learners capable of being ethical, rational, compassionate, and caring, while also helping them get good jobs is one that is valuable.

To close the gap between current learning outcomes and what is required, educational systems will need to undergo significant reforms, such as applying high-quality, equitable, and ethical standards to early childhood education and care through to postsecondary education. The goal is for India to have an education system that is second to none by the year 2040, where learners from all socioeconomic backgrounds have equitable access to the best education possible. This national education policy, which is also referred to as National Education Policy 2020, is the first education policy of the 21st century and addresses many of the country's evolving developmental priorities. This education policy is about completely revamping the system education is governed and regulated in order to better support aspects' new goals, such as SDG 4.

Education Policies of India
Post-independence, the challenges faced by the Government of India were manifold. These included low mortality rate, illiteracy, poverty, and issues related to national security due to border conflicts. Strategies and committees were developed to resolve each of the major issues. To overcome the challenge of poverty, the GoI introduced several plans and policies. Some of the commissions formed by the central government and the then Education Minister of India, Maulana Abul Kalam Azad included: University Education Commission, Secondary Education Commission, the University Grants Commission (UGC) in 1956, and the famous Kothari Commission (1964-66). These commissions were formed to propose recommendations towards improving the literacy ratio and develop a steady education system in the country.

The first educational policy was adopted in 1968 based on the recommendations proposed by Kothari Commission. The first National

Education Policy focused on bridging the gap between rural and urban population by creating equal opportunities in the field of education. This policy was considered a radical reform in the Indian education system owing to the integration at the national level. The policy promoted cultural and economic development through education and proposed the use of and learning of the Hindi language throughout the country. This specific recommendation of making Hindi a common language among Indians was largely criticized and seemed ignorant of the regional and dialectal diversity in the country. The first NEP suggested increasing the expenditure on education to 6 per cent of the national expenditure (Govt. of India, 1968).

Known for "Elimination of inequalities and equalization of educational opportunities", the second National Education Policy was adopted in 1986. The policy followed an indifferent approach in imparting education to students belonging to different casts, gender, religion and economic status. The second NEP followed a social integration as opposed to the national integration approach in the first NEP. It encourages the expansion of merit-based scholarships, subsidies to financially backward students, and promoted adult education. As many Indians remained uneducated in the pre- and post-Independence era, the second NEP took the initiative to equip adults with basic education (Govt. of India, 1986). The policy equally emphasized on improving the education quality at primary schools in the country. It also supported the distance education by launching the Indira Gandhi National Open University (IGNOU) in Delhi in 1985. Some revisions were also made in the second NEP to include vocational courses at the national level.

New National Education Policy 2020 and the Higher Education
The third and the current National Education Policy 2020 is a progressed adaption of the former two education policies. Kumar, Prakash, & Singh (2020) highlighted that the new NEP 2020 has the potential to be a 'lodestar' in transforming the future generation of the country. The policy is comprehensive and has adapted recommendations proposed in the former policies. It has appropriately considered national as well as social integration to build a comprehensive educational ecosystem in India. The new NEP took a considerate step by recognizing the diversity amongst learners in India and supported the use of native languages- as opposed to the first NEP that called for the use of Hindi language only. Moreover, the policy is drafted in a manner to address several new and unacknowledged paradigms in the pre-existing education system.

The use of ICT and internet-based e-learnings in the learning and teaching practices would enhance the quality of education, thereby, making Indian students and teachers competitive at international levels. The utilization of retired professors through mentoring young faculties is another step that would promote collaborative working spaces at the higher education level (Aithal & Aithal, 2020a). The NEP 2020 promotes the idea of a One Education system throughout the country to reduce complexities, corruption, and increase coherence at all levels in the education ecosystem. The policy has adopted the integration of vocational courses at all levels of education which is similar to the recommendation proposed by the preceding NEP 1986. Some of the key recommendations of Nep in higher education are hybrid learning model, promotion of research and development, equipping HEIs with necessary infrastructure (incubation centres, centre for academic-industry linkages etc.) multi- and inter-disciplinary knowledge to students, Faculty Development Programs, inviting global universities to set up their campus in India, and incentives for HEIs imparting higher quality of education.

Methodology
Computer-Assisted Qualitative Data Analysis Software (CAQDAS) was employed to learn the concerns and focus of NEP 2020 in India. According to Reeves, Kuper, and Hodges (2008) and Holloway & Galvin (2016) the qualitative method provides in-depth, socio-contextual, and elaborate descriptions along with insightful interpretations. MAXQDA Analytics Pro was used for further analysis.

The present study follows the inductive approach which allows the development of categories and identifying from other theories before coding processes begin (Perry and Jensen, 2001). The main source of data was Twitter. Web Collector, a utility offered by MAXQDA, was utilized to capture the tweets for analysing the sentiments about the policy. The string used for

the search was (("new education policy" OR "NEP") AND "2020"). In total, 3,607 tweets were found in the first instance, within one week of the policy releases. The authors removed the tweets with abusive language, non-English language, and other purposeful promotional post. Finally, 3247 tweets were used in the final study. The process of analysing the textual content using NLP is demonstrated in Figure 1. The specific research questions for this paper are as follows:

RQ1. How do people sentimentally/ emotionally responded to NEP 2020?

RQ2. Can Twitter communications be classified for different types of sentiments?
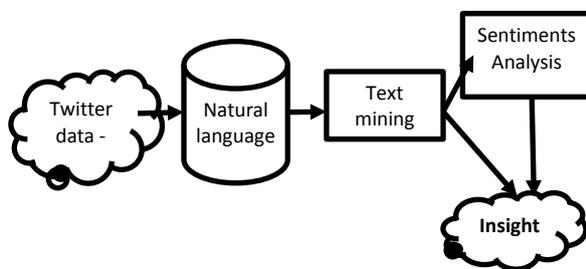

Figure 1: An Approach of Using Natural Language Pre-processing for Understanding Tweets

Data Analysis
To allow rigor and efficiency to the findings of the research, MAXQDA software was extensively used throughout the data analysis process. The data set (was downloaded from Twitter) revealed that the GOI has well-analysed the requirements from higher education. The data indicated that public opinion was also considered and the international education system is also well-taken care of by making this policy.

Word Cloud
For better visualization of the results, Word Cloud and Tree Map was generated, based on frequency and percentage of words. Figure 2 shows a Wordcloud where the keywords are represented according to their frequency in the dataset (Sinclair & Cardew-Hall, 2008).

In a word cloud, different keywords are represented based on their frequency in the dataset (Sinclair & Cardew-Hall, 2008). Figure 2 indicates the most frequent words on NEP. These frequencies have been derived from the data extracted from the Twitter. Higher size of word indicates the highest frequency. No surprise in NEP2020 as highest size. Figure 2 represents the word cloud of standard words in relation to higher education. The term NEP 2020 dominates because of its repeated usage. It is surrounded by preferential words associated with policy (university, plan, commencement, India), technology and software (education software, app, web, STPI, Parks, Twitter, Android.) and Centricity (personal, autonomous, society).
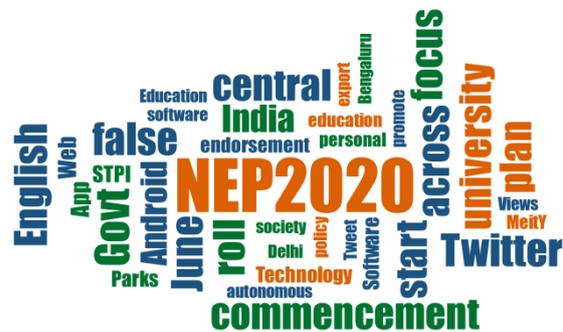
Figure 2: Wordcloud Based on the Policy Document of NEP 2020

Sentiment Analysis
Sentiment analysis is an emerging field of study which analyses public opinions, viewpoints, attitudes, emotions, and evaluations (Liu, 2012) about a specific product, service or issue. Mustafa (2018) stated that sentiment analysis identifies and extracts subjective information (available either offline or online) and combines the unstructured information using advanced techniques. These techniques include data mining, NLP, machine learning, knowledge management, and information retrieval. These views and opinions are often made in different languages, and researchers attempt to uncover the emotions of people by analysing their words. Usually, these emotions or views are regarded as either positive or negative or neutral (Yang & Yu, 2013). Sentiment analysis is widely preferred in analysing people's views and feedback on brands and services (Ainin et al., 2020). However, it is equally relevant to study a policy implementation (Kumar, Prakash, & Singh, 2020).
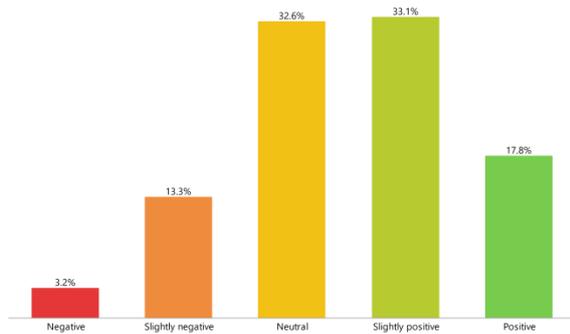
Figure 3: NEP (2020) Sentiment Analysis based on the tweets

Figure 3 represents the bar chart of tweets posted by different stakeholders about the NEP 2020. The chart highlights that a very small number of tweets decoded 'extremely negative' emotions. The 'slightly negative' tweets were higher than the 'extremely negative' tweets on NEP and almost equals to neutral. It is evident from the column chart that the good number of tweets are positive – indicating that general public (stakeholders of the policy) are optimistic about the introduction of the NEP 2020. The overall analysis indicates that the positive views concerning the NEP were largely shared on Twitter as compared to negative views. However, this analysis contradicts the findings of Saini et al. (2021) who reported negative emotions in few Indian states. The reasons are also very specific, concerning to the respective state's policy and their educational infrastructure.

With the present perspectives this paper has made an attempt to decipher the important themes and concerns of general publics and stakeholders. There deep level The text of the tweets was segregated into two files and the data was further analysed using the MAXQDA qualitative analysis software (Kuckartz & Rädiker, 2019). The two documents were named Positive and Negative and further themes were generated based on the content being analysed using content analysis based on the inductive data driven approach (Perry and Jensen, 2001). Some important themes and the major concerns are listed in Table 1 and 2. The table 1 enlists the positive comments and their major theme of discussion and Table 2 enlists the negative comments and their major themes of concern.

Table 1: Positive comments and their themes

Very positive	Major themes
The New Education Policy 2020 has especial emphasis on Inclusion and Equity and provision for creating a Gender Inclusion Fund...	inclusion and equity
A truly remarkable day in the history of Indian education system!	praiseworthy efforts
Known for working tirelessly to achieve grand goals, PM Shri @narendramodi exuded confidence that NEP-2020 is meant for the needs of 21st century and make India a global leader in science & technology.	India a global leader in science & technology
NEP 2020 says "HEIs will have clearly defined, independent, and transparent processes and criteria for faculty recruitment"- In order to implement this screening criterion for Vice-Chancellors should be displayed on a public platform !!	defined, independent, and transparent processes and criteria for faculty recruitment
NEP 2020 will create quality skilled manpower that will create quality jobs & will increase the livelihood of Indian youth...!!!	skilled manpower quality jobs livelihood
Happy to be talking about Globalisation of Education in India post NEP 2020 with some distinguished colleagues from across the globe!	globalisation of education
#NEP2020 is a revolutionary initiative to infuse multi-disciplinary paradigm in the learning process, ingrain technology as an enabler for universal access of education, encourage collaboration between industry & academia; focus on research; innovation.	encourage collaboration between industry & academia focus on research & innovation
#NEP will prepare Indian youth for new challenges in the ever evolving sphere of employment and jobs because this policy is focuses on learning rather than study and enhances critical thinking	jobs learning critical thinking
Moderately positive	**Major concerns**
NEP-2020 will make India as the global hub of quality education:	global hub of quality

Governor #NationalEducationPolicy2020 #NEP2020 #DrTamilisaiSoundararajan	education
Effective implementation of the NEP 2020 is likely to restore India's glory as a great centre of learning.	India's glory as a great centre of learning
The NEP 2020 document mentions nearly 20 great scientists, saint-scholars and thinkers from ancient India.	though on ancient India
Respecting the spirit 'Ek Bharat Shreshtha Bharat', the NEP 2020 includes systems to promote Indian languages, including Sanskrit.	Inclusion
Eminent experts from Indian and global academia deliberated on policy recommendations for @EduMinOfIndia towards the internationalization of Indian higher educational institutions in the light of the #NEP2020 (1/n)	Internationalisation
We hope NEP 2020 is implemented soon, It's really a great initiative to raise the standards of education at national level.	improvise the standards of education
Promoting Bharat Centric Education, Holistic Education, Knowledge-based Society, and Quality Education is at the centre of NEP 2020 and MyNEP Competition.	Holistic Education, Knowledge-based Society, and Quality Education
Among different approaches to make the NEP 2020 a success, the internationalisation of universities and educational institutions holds key importance.	Internationalisation
The NEP 2020 aims at making "India a global knowledge superpower"	global knowledge superpower

Table 2: Negative comments and their themes

Very negative	Major concerns
This lady is so sick of her mind who is creating so called #hindiimposition waala drama in 2020 when 3rd language is completely optional under NEP	Person specific
Need of the hour is radical change in our education system & not cosmetic one which has recently happened in the name of #NEP 2020!	No cosmetics on policy
So not a big deal if I send my kid to non eng med school	Confusion
I am just hating Indian Education system	Hatred
A re-enacted 2020 NEP for 2021 in the time of COVID-19 is simply unconscionable.	Confusion
Yet we'll face a lot of problems during implementation of the new policy.	Challenges in implementation
NEP 2020 should include plan for jail inmates education, yoga & skill development.	Equal opportunities skill development
Moderately negative	**Major concerns**
Mafias of underground eating the essentials of society in education sector & perhaps a stumbling block in the implementation of NEP 2020.	Challenges in implementation
2020 NEP has bought new revolution in education but I am sure that 100% it is not going to work out now, because 99% management of schools and teachers are not committed for new changes and they are not willing to tran	Challenges in implementation
The aversion towards English is inbuilt feature of R.S.S. It is the reason why NEP 2020 undermines English, promoting Hindi and Sanskrit.	Confusion
If we teach students today, as we taught yesterday, we rob them of tomorrow.	Confusion

Table 3 very well summaries the sentiments of general public with different themes. The positive themes are global, internationalization, inclusion, equity, livelihood, and related themes. Whereas, most negative node is confusion and challenges in implementation. This very clearly indicate that along with the policy the leaders need to think on how to implement the policy and how to remove the confusions. If the general public is confused, then it will be a challenge to implement the policy. The ways and means of implementation need to be well thought.

Table 3: Sentiment based categories of themes

Major themes	Positive	Negative
global hub of quality education	56	
India's glory as a great centre of learning	68	
inclusion and equity	39	
Internationalisation	178	
improvise the standards of education	67	12
Holistic Education, Knowledge-based Society, and Quality Education	56	
livelihood	48	8
encourage collaboration between industry & academia	82	
focus on research & innovation	59	23
skill development	12	34
Challenges in implementation		121
Confusion		157

Discussions and Implications

The National Education Policy 2020 introduced by the Indian government is the third education policy since Independence. The transformation of the educational ecosystem is a prerequisite to advance the growth and development of India to meet future obligations, especially to achieve the SDG 4, UN Agenda for Sustainable Development by 2030. The NEP reflects a comprehensive paradigm of the Indian educational system that aims to foster quality education, develop research background, equip students and teachers with necessary skills, and support HEIs. This would lead to the overall development of the education system and the advancement of human resources in the longer run.

The study analysed the concerns and issues at the higher educational levels i.e., graduation, post-graduation and PhD. The analysis highlighted that major higher education focuses mainly lie in three dimensions- course, students and language. The courses are divided as basic, professional and vocational with multiple exit points in pursuing the courses. These courses would be designed to develop critical skills among students, and help them get jobs or start their enterprise. The lectures and curricula shall aim to offer interdisciplinary and multidisciplinary knowledge to students so that they explore more opportunities after completing their education. For example, a psychology stud ent will also be able to study tourist behaviour or big data analysis. This will help that student to develop a broader understanding of different subjects. Moreover, the NEP is distinct from its preceding policies in terms of the significance given to the integration of vocational courses at different levels. Tiwari et al., (2020) also reported the significance of vocational skills in equipping students with industry-level skills. The study confirms that the NEP lays a strong foundation for future generations by providing holistic development of students at different stages of education.

Secondly, the policy stressed augmenting the educational system around the needs and interests of students. Early selection of subjects, promoting fun activities at school and college levels, adopting ubiquitous digitalization strategies, online distance learning opportunities, learning-by-doing curricula, and competency-based assessments would help students to realize their full potential. Aithal & Aithal (2020) suggested that the Indian government should consider providing merit-based scholarships and education loans to students irrespective of their socio-economic background. Lastly, the policy is considered favorable owing to the initiative undertaken to promote Indian languages in the education system. Creating a student-centric education system also requires giving them the flexibility to choose the language for learning and writing. India is a country that has more than 200 dialects and they change every few miles. The new NEP allows students to opt for their regional languages at higher educational levels also. This concern has manifold benefits- students can freely express their views and write exams in their regional language at HEIs, gives them pride in their regional individuality, and promotes the regional culture of Indian states at the national level. Moreover, students will also have an option of third language which could be used as a bridging language. Overall, the policy documents signify that the GoI is primarily concerned to transform the pre-existent educational system and develop a unified education framework in the country.

Tholath (2021) identified that the NEP positively influences the artistic, cultural, and historic

heritage of India. The policy ensures that Indian values and culture are not lost in adapting to the western educational systems (Tholath, 2021). The NEP 2020 transforms the existent education system by broadly focusing on three sub-themes namely, development of curriculum, student and courses. Courses and curriculum would be developed to enhance students' aptitude and equip them with multidisciplinary knowledge and skills. This policy will have post-COVID-19 implications for the stakeholders. The post-crisis education system requires teachers to develop their pedagogical skills, incorporate technology in the delivery of lectures, and update themselves to meet the evolving needs for benefitting the larger society. Curriculum design will play a central role in building a strong foundation for students as an unprecedented shift from theoretical learning to real-world application of theories would be required. The policy's idea of embedding regional language for students at HEIs would make higher education accessible to the young population in tribal and rural areas of the country (Kaurav et al., 2020). Moreover, the objective of NEP to increase the gross enrollment ratio to 50 per cent would subsequently increase the employment ratio in future. However, there are a few challenges that should be considered to ensure feasibility in the long run. Firstly, the educators should also proficient in regional languages to impart education to specific students. Secondly, curriculum design is a vital part of ensuring the quality of education, and thus creating committees (either discipline wise or grade-wise) of experienced teachers and policymakers would help bring better knowledge outcomes among graduates/postgraduates. This would also lead increase the probability of creating industry-ready professionals and entrepreneurial mindset amongst them.

The world cloud demonstrated the emerging use of technology-related terminologies – indicating the NEP's emphasis on incorporating technology and digitisation in the education system. Considering that e-learning is the need of the hour (Kaurav, Rajput, & Baber, 2019), the policy frequently stressed using ICT in pedagogy (Tholath, 2021). The post-COVID-19 scenario is likely to accelerate the way the world will operate, and technology would become the epicentre of individuals' lives. Certainly, the NEP's futuristic vision envisaged the post-crisis phase and developed the policy framework to ensure quality education includes advanced ICT.

Even the students (at school and university level) would benefit from a variety of digital learning tools, technology centres for conducting quality research, online digital learning courses, digital libraries, and ICT-enabled infrastructure at HEIs. Imparting technical languages would expand students' knowledge in the field of technology, biotechnology, big data analysis, nanotechnology and so on. NEP mentioned introducing a National Education Technology Forum where students can share their ideas on using and developing technologies. While the crisis amplified several issues faced by HEI, students and teachers- one of them being the 'digital divide', Dutta (2020) stated that effective implementation of SWAYAM would bridge similar situations. The initiatives like SWAYAM and Swayamprabha would develop the digitisation process in the education ecosystem and help students from backward socio-economic background to join the knowledge economy (Dutta, 2020).

From the mind map, the NEP's aim of building an Indian higher education system with advanced facilities was evident. A greater emphasis on critical assessment, Indian languages, community benefit, and stakeholders' development would broaden the horizons for the educational sector. Moreover, welcoming foreign universities in higher education, offering international level pedagogy, and student exchange programs demonstrate the larger aim of making India an educational hub in the future. To attract foreign universities and foreigners, GoI must strategize to make India a safe place for foreigners. Further, the policy has suggested putting a cap on the fees charged by private HEIs, the upper end is still uncertain. Lastly, the NEP has encouraged the world's top HEIs to set up their campus in India however, adequate infrastructure, land availability, and inculturation concerns would predominantly challenge the implementation.

Behavioral responses towards policy implementation provide a prima facie overview that can be evaluated in future to monitor the policies. This study also conducted a sentiment analysis using Twitter mining to examine the degree of emotions among different stakeholders. In contradiction to the research by Saini et al. (2021), stakeholders showed positive emotions and welcomed the NEP 2020. Saini et al. (2021) pointed out that some states had negative emotions in accepting the NEP,

thereby, policymakers should attempt to bring awareness about the related benefits of the policy. The positive emotions are influenced by the comprehensive nature of the NEP which is built on five pillars- Accessibility, Equity, Quality, Accountability, and Affordability (Kumar, Prakash, & Singh, 2020). These pillars considered the requirements of three prominent stakeholders- students, teachers, and HEIs by ensuring holistic development. Furthermore Aithal & Aithal (2020) suggested following the top-down approach for effective implementation of the policy. Likewise, Lissen & Bautista (2020) proposed maintaining a balance between global and local; and contemporary and conventional areas for achieving long-term sustainability in education.

Conclusions

The radical reform proposed by the third National Education Policy 2020 covers broad dimensions of ensuring sustainability in achieving quality education in the coming decades. The extensive framework focuses on the holistic development of learners, educators, HEIs and the nation. The policy draft aptly imbibes the contemporary trends and adequately adapted the features of the western educational system while keeping the Indian-ness at the core of the proposed education system. Even though the NEP 2020 offers a futuristic vision to transform the educational ecosystem in India, adoption of the policy is not a compulsion for HEIs and schools. This study aimed to qualitative explore the crucial paradigms of the NEP 2020 through sentiment analysis using Twitter mining and extracting themes from policy documents. The study is a theoretical extension of the evolution of educational systems in India.

Academic courses, student centricity, and language came out as the key excerpts from the policy documents of NEP 2020. The increasing emphasis on incorporating ICT in the learning and teaching environment, and HEIs infrastructure was significantly evident in the graphical representations. Similarly, the NEP aims to foster community development by imparting knowledge-based education amongst the students at all levels. At the HEIs, the policy proposed substantial changes to ensure that these institutes equip students with industry-level and entrepreneurial; skills in graduates and post-graduates. Another theme on stakeholders' development was also reported in the analysis-

ensuring teachers are trained through online and offline FDPs, and HEIs promote research culture among students and teachers. The flexibility of using native or regional language in classrooms is another parameter that will encourage students from remote locations to pursue higher education, and become a part of the knowledge economy. The wide range of courses at higher educational levels (from agriculture to technical advancements), integration of vocation courses at all levels, digitisation of education, accessibility and affordability for learners, and reshaping the curriculum and pedagogical practices indicate radical renovation of the Indian education system.

The NEP 2020 promotes quality education through the channel of transformation in the educational ecosystem. Staring from schools up to higher-level courses, the experiential learning process is encouraged. Assessment based on students' aptitude, competency to apply theories to solve real-world problems, and extra co-curricular activities would allow students to be more creative and innovative. As the NEP 2020 open the gates for the world's top universities to set up their campuses in India, students and teachers would get better opportunities. It would also prevent the issue of 'brain drain' in the longer run. However, the Government of India should equally strategize to create employment opportunities for future generations.

To summarize, the essence of the policy lies in its comprehensiveness. It takes a 360-degree approach to improvise the conventional educational practices in India. Perhaps, this could be the reason behind positive sentiments from stakeholders. The NEP is a radical revolution in the Indian educational ecosystem which must be implemented incrementally to witness the effectiveness in the short run. Certainly, the policy is futuristic and meet the demands of teachers and students at large, however, its implications would vary in different states.

The main issue is that the general public and stakeholders appear to be positive, however, they are apprehensive about the execution of the policy. They are enthusiastic about the concept, but the document is perplexing to them. The policy is inclusive and fair opportunity while yet looking for methods to internationalize. Positive views are reported on livelihood and holistic

education, but unfavourable sentiments are reported on skill development and developing a good ecology for research and innovation mechanisms. Overall, many people are optimistic about the policy, and fewer are unable to express their dissatisfaction. But, it is equally desirable that the GoI resolve the concerns raised among general publics. This would help in the effective implementation of the policy in the long run.

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