Indian Research: Policies and Practices to Enhance the Quality of Research through Indian Open ETD Repository

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Abstract. New Education Policy (NEP2020) is getting implemented in India to revamp and reform the higher education sector with changes in policies and practices with access, equity, quality, affordability & accountability which is also giving focus on Indian research. The University Grant Commission (UGC), an apex body of Govt. of India which is entrusted with responsibility of regulation, monitoring and policy-making for Higher Education Institutions (HEIs). Research works in Indian Universities are made available in open ETD repository called Shodhganga for world wide access as per the policy and practices followed in the country. The open access to the research repository is a boon to the Indian scholars for enhancing the quality of research. This paper finds the work flow, growth, and major thirst area raised on the analysis of Indian repository which is hosting 3,50,000 theses from 530+ contributing Universities. This paper discusses policies and practices based on important regulations/notifications which has led India in improving the quality and quantity of research in terms of scholarly publications as well as awarding of PhD degrees, growth of the India ETD repository along with tools provided under Govt schemes (ShodhShuddhi) to academic Institutions for quality monitoring is also discussed.

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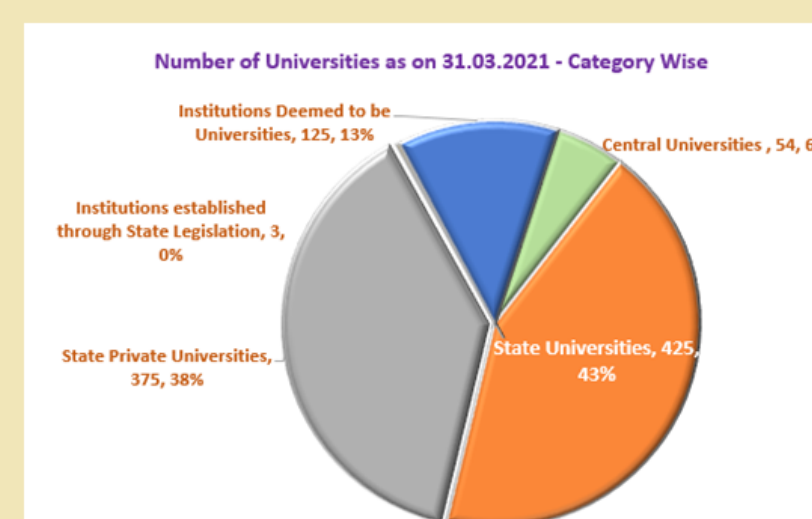
Affiliations

Information and Library Network (INFLIBNET) Centre, Gandhinagar is an Autonomous Inter-University Centre (IUC) of University Grants Commission, New Delhi (Ministry of Education, Govt. of India). It is a major National Programme initiated by the UGC in March 1991 as a project under the IUCAA, it became an independent Inter-University Centre in June 1996. INFLIBNET is involved in modernizing university libraries in India using the state-of-art technologies for the optimum utilisation of information.

Introduction

At the time of the Independence of India in 1947, there were only 20 Universities and 500 Colleges in the country with 2.1 lakhs students enrolled in the Higher Education Institutions (AR FY 2010-2011). Now, the higher education system in India is comprising of 1069 Universities/ Institutions including Institutions of National Importance and 45562 Colleges (AR FY 2020-2021) with an enrollment of 394.34 lakhs students in graduate programmes to doctoral programmes. Indian ETD Repository, Shodhganga, is created based on UGC Notification on Minimum Standards and Procedure for award of M.Phil./PhD Degree), Regulations 2009. About 800+ Universities are providing doctoral programmes and 680 Universities/Institutions (HEIs) have signed MoU for uploading electronic copy of theses into the national repository, Shodhganga. The notification is the first attempt to provide comprehensive national policy on Doctoral programmes followed by many guidelines and Notifications issued to enhance quality of research.

Category-wise Universities in India

Objective

To find out how Policies and Practices are followed in India to promote ETD ecosystem.
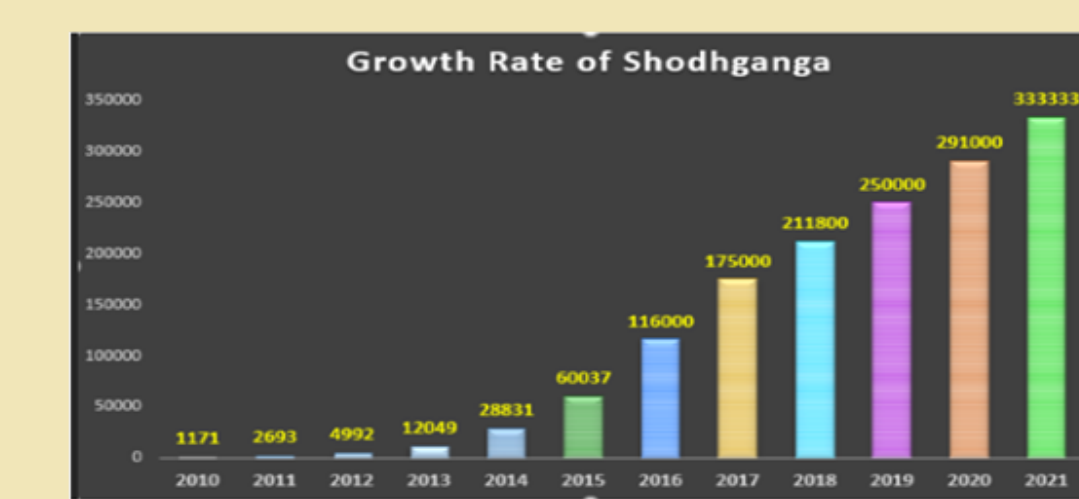
Methodology

Policies are made by Govt. bodies and Ministries from time to time mandating the submission of digital Theses in a national repository in 2009 and checking of plagiarism prior to the submission of the PhD Theses in 2018. The implementation of the policy in the Institute is studied at the national level by observing the systematic growth of the repository as well as document submission for similarity check.

Data is collected from various sources including some Govt. portals like the UGC/ AISHE portal, and MoE websites for checking the authenticity of the data submitted by the Higher Education Institutions. University-wise progress and subject/discipline wise analysis and study is done for 1069 Higher Education Institutions (HEIs).
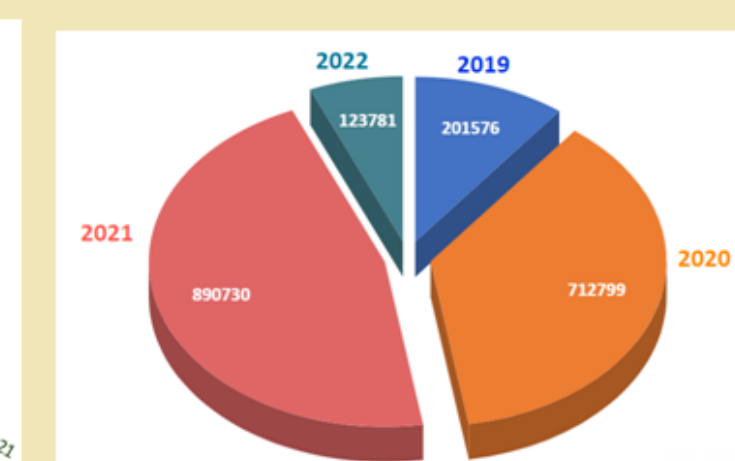
Results
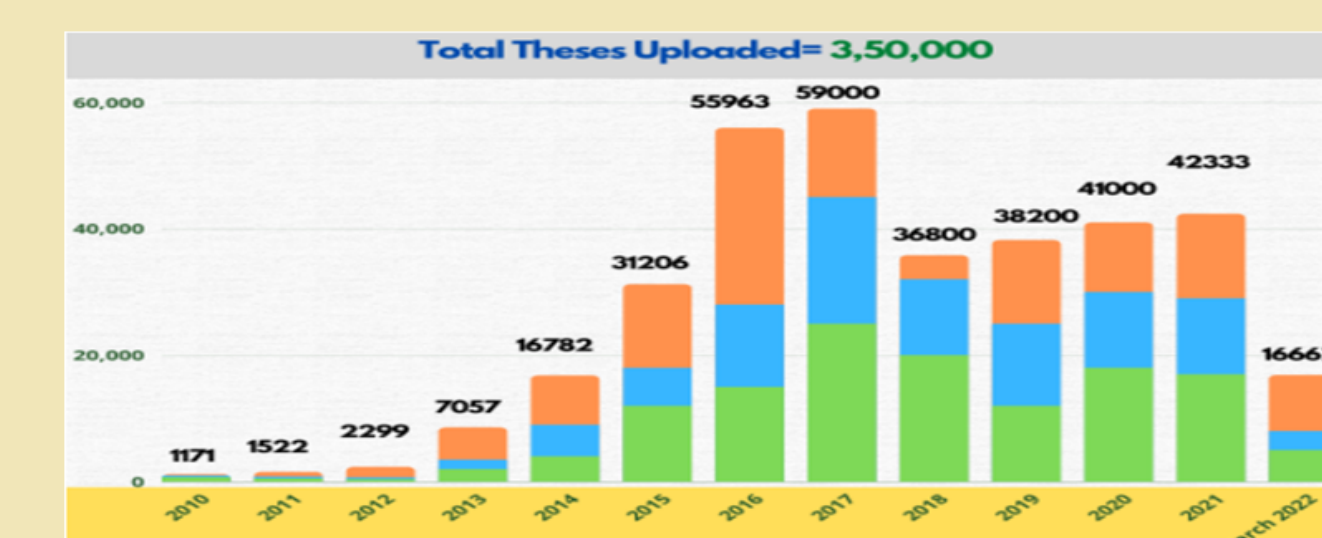
Systematc growth after right policies

Year-wise growth of ETD Repository (2010-2021)

No. of PhD Theses Awarded in India from 2009-2021

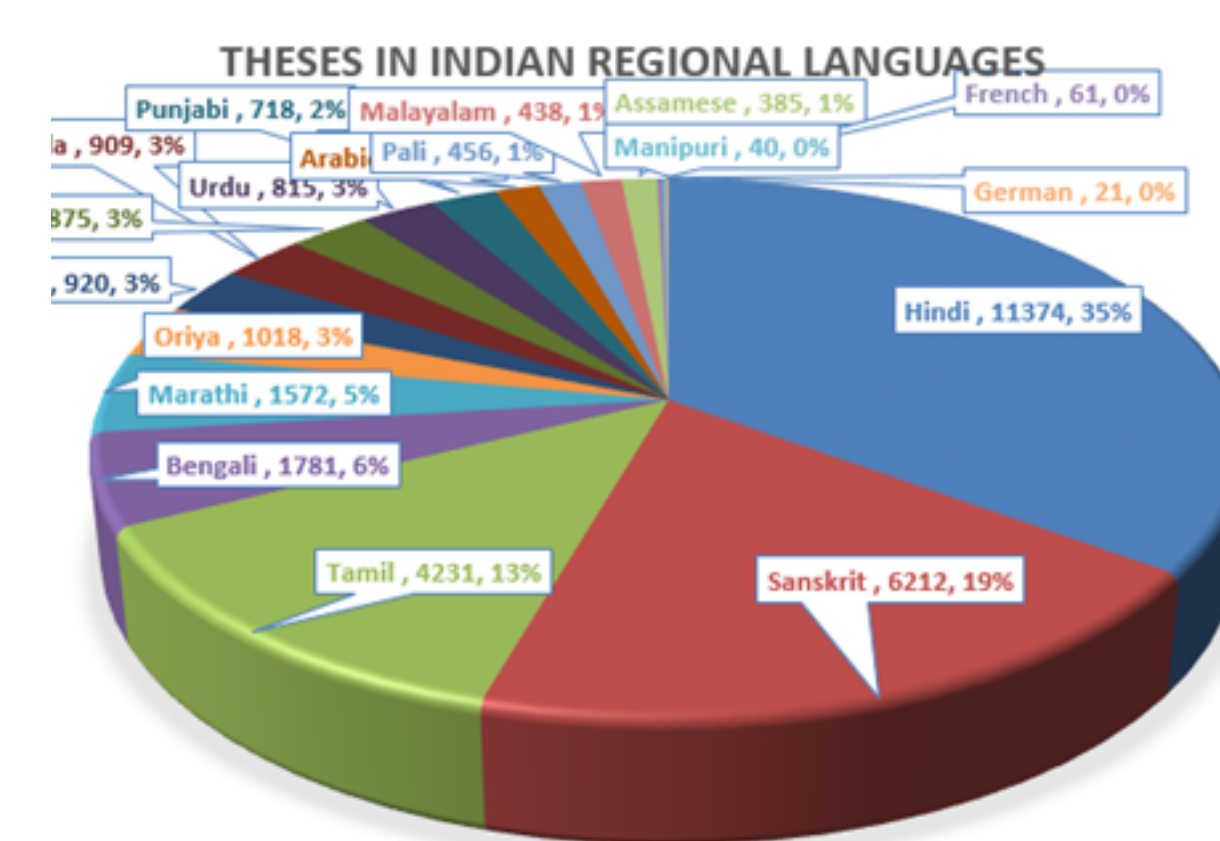**Year-wise Documents Submission for Similarity Check in ShodhShuddhi/PDS**

No. of Theses submitted in each year into Shodhganga (2010-2022)
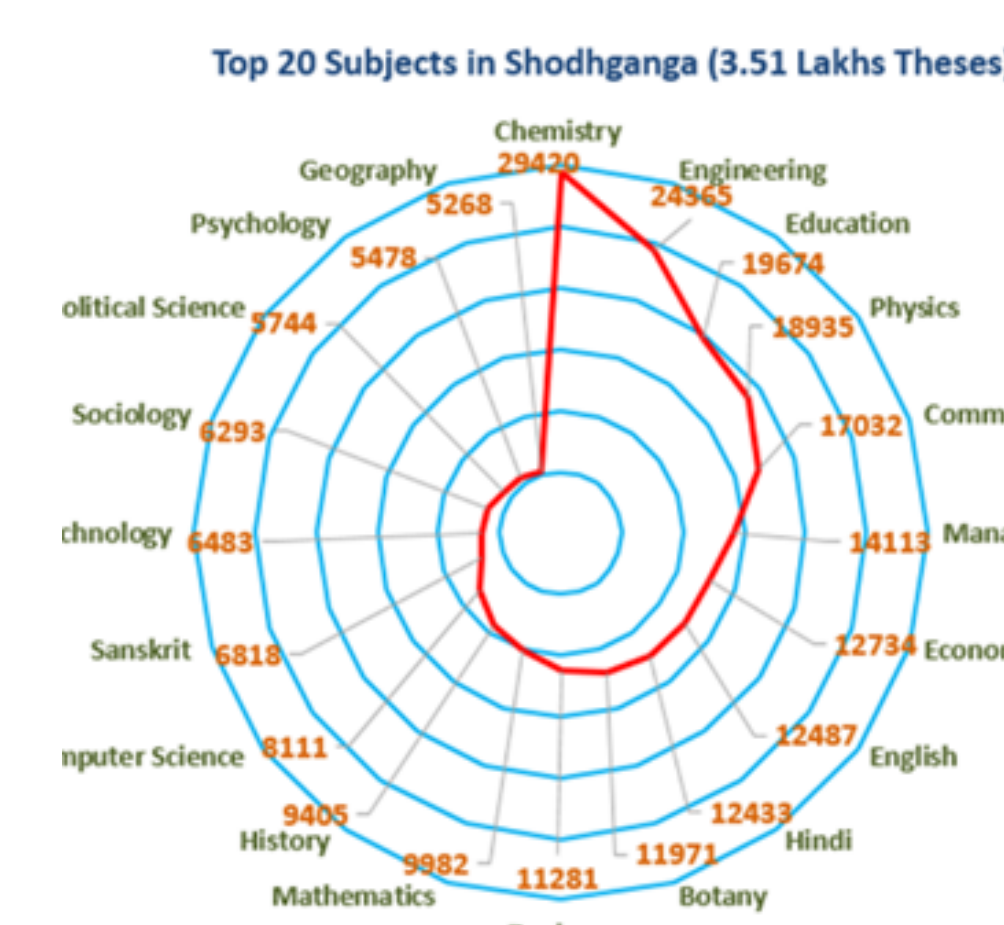
Analysis

Out of 3 Lakh PhD Theses, which were uploaded in the first 10 years (till April 2021) of the existence of ETD repository, Chemistry subject Theses are highly getting uploaded into Shodhganga portal which shows that highest research were conducted in Chemistry discipline followed by Engineering, Education, Physics etc. and the lowest number of Theses uploaded in the subject of Psychology and Geography were research need to be strengthened.
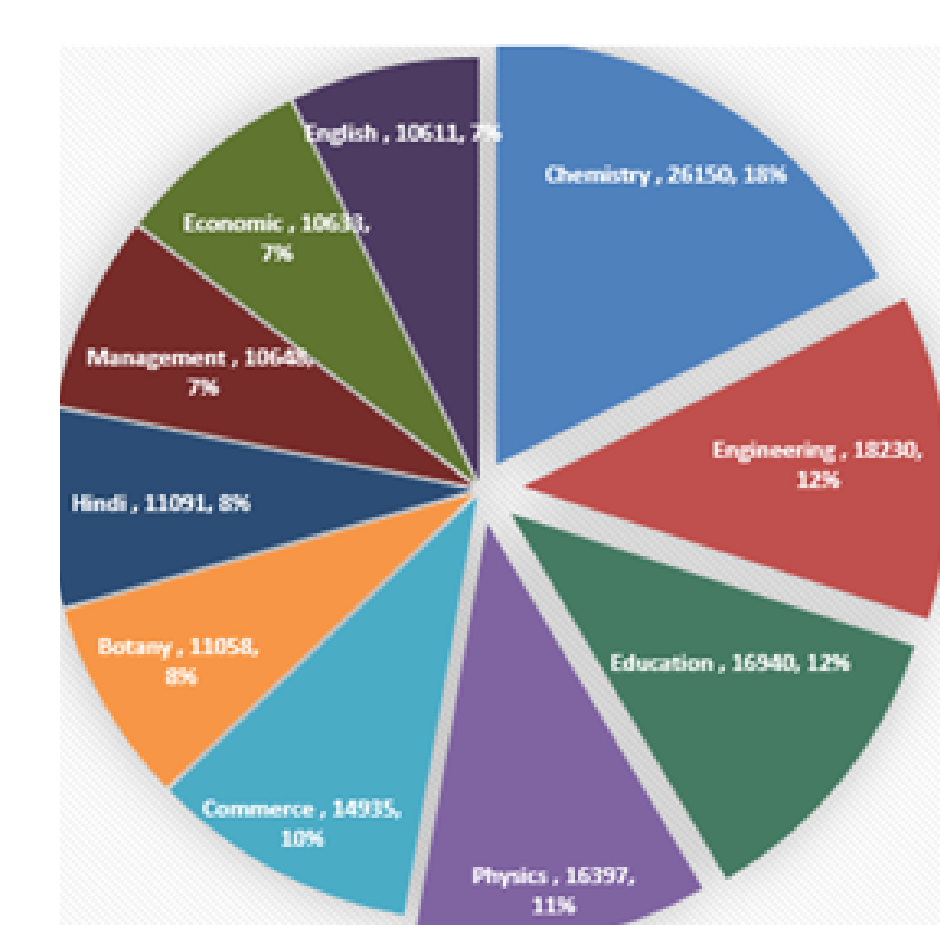
About 10.6% (i.e. 31744) overall Theses submitted from 16 regional languages with Hindi (11374, 33%) in top followed by Sanskrit (6212, 19%) and Tamil (4231, 13%). The other regional languages such as Bengali, Marathi, Oriya, Gujarati, Kannada, Telugu, Urdu, Punjabi, Pal, Malayalam, Assamese and Manipuri have presence in Indian ETD repository. Foreign languages like Arabic (480), French (61), German (21)and Japanese (2) theses are also uploaded by the Indian Universities. Out of 1069 Higher Education Institutions, 714 universities have participated by the signing of MoU and started contributing Theses into Shodhganga. 858 Universities started using the Plagiarism Detection Software provided by the INFLIBNET Centre through funding from the Ministry.

Regional Language Theses in Shodhganga

Subject wise Theses in Shodhganga

Subject wise Theses in Shodhganga

Summary at a Glance As on 02.09.2022 09:47 am

1069 — Total Member Institutions
132947 — Total Users
2431233 — Total Documents Submitted

Conclusion

About 400000 theses are now getting submitted and getting all theses to a single national repository was not an easy task. There were slight resistant in the formative years when started ETD Repository. As it is seen in the growth chart, in first year (2010) only 1171 theses are uploaded, but in the last year (2021-22) about 50,000 theses are uploaded. The repository has grown into 3,50,000 as on 31.03.2022.Out of 3 Lakh+ PhD Theses, which were uploaded in the first 10 years (till April 2021) of the existence of ETD repository, Chemistry subject Theses are highly getting uploaded into Shodhganga portal About 2 Million documents are checked for plagiarism from Sep'2019 onwards. Nation is expecting the high quality research papers and Ph.D. theses in the coming years.

Related literature

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