

# **Information Technology**

### INFORMATION TECHNOLOGY

With diversification of the ICT landscape and Digital India initiative, it has become absolutely imperative for the Government to bring in qualitative and quantitative transformations in wake of the changing user expectations. In the year 2022-23, Ministry of Coal, along with NIC has striven hard and taken lead towards standardization and improvement in IT working environment and service delivery.

NIC has a dedicated team in Ministry of Coal with an officer of the rank of Deputy Director General (DDG), two Senior Technical Director one as Head of Department (HoD) and a Scientific/Technical Assistant-B. Ministry has undertaken various Projects/Activities in coordination with National Informatics Centre (NIC) cell of the Ministry under the following categories:

## 1.1. Information & Communication Technology (ICT) Projects/Activities

- Design, Development & Implementation of e-Governance Projects and related training
- Design, Development & Hosting of Web Site
- Design, Development & Implementation of Web Portals and Web Based Applications
- Deployment of Web Sites, Web portals and Web Based Applications on NIC Cloud -Meghraj to ensure optimum utilization of the infrastructure and speed up the development and deployment of e-Governance applications of Ministry.
- Cyber Security Audit Compliance
- Maintenance of Local Area Network (LAN) and Internet Services
- Support on e-mail
- Video Conferencing

- Support to Coal India Limited and its Subsidiaries, NLCIL, SCCL and CMPFO in their ICT related projects/activities
- 1.2. e-Governance applications/Portals NIC also provide supports to Ministry officials on generic e-Governance applications such as:
- https://coal.eoffice.gov.in
- https://pgportal.gov.in (portal for grievance redress and monitoring system)
- http://bhavishya.gov.in (pension, sanctions and payment tracking system)
- https://e-samiksha.gov.in
- https://limbs.gov.in (web application for digitization of Court cases)
- e-tendering (Centralized Public Procurement Portal for tender publishing), e-HRMS (Human Resource Management System), e-service book, SPARROW, e-Visitor Management System, GLIS, Aadhar based biometric attendance system, PFMS, etc.
- 2. Single Window Clearance System is the innovative endeavor of the Ministry of Coal conceptualized and launched in 2021 that facilitates to obtain clearances and approvals required for smooth operationalization of coal mines in India as well as augmentation of coal production in the country through a single gateway. Various statutory provisions viz approval of Mining Plan and Mine Closure Plan, Grant of Mining Lease, Environment and Forest Clearances, Consent to Establish, Consent to Operate, Wild Life Clearance Permission for Explosive and Safety organization (PESO) for storage of Explosive, Land Acquisition Module, Safety Management Plan (with DGMS), Central

Ground Water clearance etc. are pre-requisite for starting of a coal mine.

These clearances are being granted by various Central Ministries and State Government departments/ agencies. This portal maps all the statutory clearances required (covering Central Ministries as well as State Government departments/agencies) for starting of a coal mine. The portal is to map not only the relevant application formats but also map process flow for grant of the approval/clearances and integration with online portals through API

To facilitate ease of doing business, a unified platform of SWCS is designed which includes already operational module for approval of mining plan and mine closure plan in a time bound manner and integration with Parivesh Portal Version 1.0, digital acceptance of objection under Section 8 (1) of Coal Bearing Areas (Acquisition & Development) Act, 1957, Consent Management System of Telangana & West Bengal.

Further Ministry of Coal has added in its kitty of SWCS "Project Information & Management Module" (PIMS) which was launched on 14.06.2022 and live with screens PRIMS Agreement Form Production Target Form and Daily Production report screens etc. which is likely to facilitate project proponent as well as Ministry and State officials in monitoring and expeditious implementation of coal mines. Further development of Mine Opening Permission Module, Process flow study of exploration module and Mining Lease etc. are the next major targets to be achieved in development of this portal.

Also, integration of SWCS portal of ministry of coal with National Single Window Clearance System is also being carried out as a part of Digital India for which PING API, Authentication API, Pull Document and Push Redirection API is completed. Project Proponents can now successfully register through NSWS Portal.

3. Coal Import Monitoring System (CIMS) has been developed and maintained for importers to submit

advance information in an online system for import of coal items. This portal will enable the government to keep a tab on the various categories of coal being imported and help make policy decisions accordingly.

CIMS Portal facilitates the importers to submit advance information for import of Steam Coal. On submission of online data/information, the system generates an automatic unique Registration Number. No manual documents are to be submitted to any public authority for this purpose. Importer shall have to enter the Registration Number and expiry date of Registration in the Bill of Entry to enable Customs for clearance of consignment.

CIMS also has the facility to view earlier online registrations. In addition, incomplete applications which have not been submitted for registration on the Directorate General of Foreign Trade (DGFT) portal are also available in the CIMS for review and further action.

4. The official website of Ministry of Coal - Website is an integral part of any organization. The official website of Ministry of Coal https://coal.gov.in is bilingual, user-friendly and provides an easy navigation and quick access to important and latest updated information. Website is hosted at NIC cloud server. The website was made responsive to enable accessibility from mobile devices.

This website is improved and enriched by adding latest Coal Statistics such as coal production & Supply, Coal block allocation & auction of coal mines, Safety in coal mines, Acts & Policies, Citizen Charter, Tender notices, Advertisement, Annual reports, Events, Press releases etc. Website is updated regular and enriched by adding Major achievement and by adding video content and photo galleries (Programme/Event wise) etc. Paying due attention to ensure timely updation of the website. The website is GIGW compliant and certified by STQC. SSL certificate installed on the server to make a secure session with browsers.

- 5. Coal Projects Monitoring Portal A web-based online system has been successfully developed and maintained in the Ministry. This system resolves various issues submitted by stake holders of coal projects pending with various Central Ministries as well as State Governments. The stake holders for this application are, Industries, Coal Companies, CIL, NLC, State Govts, and Ministries/Departments. Portal allows submitting pending issues from various stake holders. These issues are closely monitored, discussed and resolved on this platform, thereby eliminating cumulative information seeking and decision-making delays. Portal provides platform for regular monitoring and compiling state wise pending issues.
- 6. Coal Allocation Monitoring System (CAMS) -A web-based application for monitoring of Coal allocation had developed and maintaining in the Ministry of Coal to monitor the allocation of coal by Coal India Limited (CIL) to States, States to State Nominated Agencies (SNA) and SNA to consumers in a transparent manner in the Ministry of Coal. As per Coal Distribution Policy, coal per annum is earmarked for small and medium sector consumers whose requirement is less than 10,000 tonnes per annum. The sector consists of units like rolling mills, cookery, brick kiln, Refractories, Glass, Engineering Machinery, textile/rayon, paper, soap, leather etc. Main Features of Application is, Role based access by all stakeholders' tasks distributed, transparent coal allocation distribution data in public domain, Check on Price charged and uniform sale margins, Tracking and monitoring of activities by stakeholders, etc.
- 7. e-Office a web-based system implemented and maintained for effective online monitoring of movement of files and receipt in the ministry. Continued support on implementation of e-office. New officials were provided necessary training and VPN accounts were provided to senior officers to access e-office from outside office also to ensure nonstop working in e-Office Platform. Ministry of Coal has successfully migrated into the new version

of e-office 7.x.

- 8. Star Rating of Coal Mines Coal Mining operations are expected to comply with many rules, regulations. These are mainly regarding safety, environment, rehabilitation of project affected families, welfare of workers etc. all the mines are expected to comply with all the regulations. It becomes important to identify the best performers in terms of above-mentioned areas and give them due recognition. Ministry has developed and maintaining a web portal called Star Rating of Coal Mines which is expected to do the same. New features and functionalities are added in the portal, some of which are as generation of different reports, rating finalized after the validation exercise communicated to the coal mines through email, viewing reports by Coal India Limited and its subsidiary has been generated.
- 9. Koyla Darpan (Coal Dashboard) In order to share Key Performance Indicators (KPIs) related to the Coal Sector to end users, a portal "Koyla Darpan" has been developed, implemented and Implemented in the Ministry. This portal monitors real time Coal production and Coal Dispatch on a daily basis. Data related to Coal production and Coal Dispatch is fetched from Coal India Limited and its subsidiaries, Singareni Collieries Company Limited (SCCL), Neyveli Lignite Corporation India Limited (NLCIL), CCO through API.

As an initial step, the portal has following KPIs:

- 1. Coal/Lignite Production
- 2. Coal/Lignite Offtake
- 3. Exploration
- 4. Central Sector Schemes
- 5. Status of Coal Stock in Thermal Power Plants
- 6. Infrastructure
- 7. Allocation of Blocks (CMSP/MMDR)
- 8. Monitoring of Major Coal Mines (CIL)

#### 10. Coal Price

Portal comprises different type of graphical reports with respect to Coal Production and Coal Dispatch. Most of the KPIs are updated through API in the portal.

11. A Coal Task Master portal has been created for real time monitoring of instructions and decisions of key projects, tasks and activities assigned to different sections of the Ministry of Coal for making effective decisions, tracking, information sharing and cross functional learning.

12. e-HRMS (Human Resource Management System) The project of Department of Personnel and Training (DoPT) - e-HRMS was customized and implemented for the Ministry. It provides various on line facilities related to services of Cadre officials of DoPT. The facilities include maintenance of eservice book, leave, tour, training, LTC, deputation online using a work flow. The service books of all officials were digitized, authenticated by individual and Administration and software was customized for work flow of the Ministry. Employees shall not be dependent for data updating on administration, but they may themselves update the data with their login subject to verification by concerned administration. They will be able to track status and match details instantly.

13. Video Conferencing facility – Studio based Video conferencing (VC) and Desktop based VC (BharatVC), a secure communication facility provided by NIC in the ministry was extensively used by Secretary and other senior officers of the Ministry on daily basis for monitoring the coal production and offtake and supply to Power Generation projects in India with Coal India Limited and its Subsidiaries, SCCL and NLCIL, Conduction Board Meeting, Sub-Group Meeting, etc. Around 350 Video Conferencing sessions were conducted successfully during this year. This facility is successfully being used by Secretary (MOC) during PRAGATI meetings taken by Honourable Prime Minister.

### 14. Schemes on PRAYAS-PMO Dashboard (https://prayas.nic.in):

Two schemes of Ministry (Coal Production & Coal Dispatch) on daily basis were made LGD (Local Government Directory) compliant and integrated with PRAYAS dashboard of PMO using Web APIs. The dashboard shows various KPIs with time series analysis for monitoring at apex level.

#### 15. Data Governance Quality Index (DGQI):

With emerging international evidence of the vital role played by data as an enabler in driving public policy across its lifecycle, NITI Aayog in 2020 started an initiative of Data Governance Quality Index (DGQI) tools which provides a unique framework for self-assessment of data preparedness levels across the Central Ministries/Departments/State Departments on various themes like data generation, data quality, use of technology, data analytics, data security and best practices.

The intent of the DGQI is to enable Ministries/Departments and state departments to assess themselves at various levels of data maturity on the basis of a standardized framework, which in turn would facilitate deepening of digitization in the Government of India. Under the realm of the overall approach, six key themes have been identified under data systems pillar covered by the Data Governance Quality Index: Data Generation, Data Quality, Use of Technology, Data Analysis, Use and Dissemination, Data Security and HR Capacity and Case Studies.

Ministry of Coal also took part in DGQI exercise based on scoring criteria fixed by the NITI and demonstrated various initiatives taken by it since 2018 to infuse technology in governance. Amongst 67 Central Ministries/ Departments and 275 Central Schemes/ Central Sponsored Schemes, covered by DGQI, Ministry of Coal scorecard is as under:

Category	Score
Overall performance amongst 67 Ministries	4.16/5