

Senior Executive Greeting

Sri Rahardjo



Greetings to our respectable partners,

I am the Senior Executive of TURATECH,
Sri Rahardjo, M. Eng

I am delighted to introduce TURATECH as part of a pioneer of Indonesian techno-solution provider and IT company with focus in mining & energy industry.

TURATECH is a part of TURA GROUP and also in affiliation with Tura Consulting Indonesia. TURATECH has an enormous journey and been growing along with TURA GROUP. Since starting this company, it has become clearly that while the mining and energy industry remains an attractive sector, it is entering a period of significant change bringing both challenges and opportunities.

As a professional IT company in Indonesia, our commitment is to provide added value techno-solution in form of excellent IT services and products in order to support sustainable growth of Indonesian mining and energy industry. We also committed to develop and provide IT services and products in supporting the government and industries in order to optimize mining and energy role as a prime mover of sustainable development, especially in this very moment of Industry 4.0. We do hope our IT services and products could also be part of our contribution to bring mining and energy sector closer to the public.

We believe that by performing those missions and applying our core values of professionalism, integrity and solidarity in all of our actions, we could achieve our vision to be the most valuable IT company in Indonesia's mining and energy sector.

In the past decades, digitalization has grabbed attentions from many stakeholders and become significant for global mining sector as cohesive approach to reach more efficient, effective, adaptive and sustainable mining operations. There are several key drivers that make mine digitalization application become largely required

to provide better information for monitoring, controlling, analyzing, and mitigating the risk of future uncertainty, for instance, the changes in supply-demand due to price volatility, end-market consumption trends, circular economy initiatives, resources scarcity and reserve depletion, a growing awareness of sustainable environment and social responsibility.

Digital technologies have tremendous potential to bring a significant added value and growth to mining and energy stakeholders. For example, there are mine digitalization approach can be applied in mining and energy value chains:

1. Sensory automation and robotics operational hardware/equipment,
2. Real time integrated database platform and information systems,
3. Digitally connected workforce, and
4. Cloud based analytics & decision making support.

Advances in digital technology could benefit mining and energy industry in various ways, such as increase in overall equipment effectiveness, increase operational safety, faster and better decision making as well as overall operational cost efficiencies.

As a country with a strategic position over global mining and energy commodities supply chain, Indonesia should accommodate and apply digitalization in mining and energy industry as one of many solution to overcome the industry's barriers and challenges. Several difficulties are commonly faced by mining and energy stakeholders: the needs for techno-solution to increase overall operation efficiencies, lack of integrated and comprehensive database, lack of regulation compliance, lack of interconnected equipment-human ecosystem in field operations to provide real time data analytics and decision making,

and the needs for digitally connected workforce to enable safer and healthier mine operations and mine environments.

We believe that despite high investment is required, the implementation of digital technologies will yield benefit for the stakeholders both in the short run and in the long run. We do put our best efforts to provide the most valuable techno-solution while optimizing the available resources. Our commitment is to develop IT services and products by using cutting edge digital information technology. This is supported by our team that widely experienced in mining and energy industry both in national and international level as well as supported by our strength in project management.

Finally, we proud to contribute and take part in growing Indonesia's mining and energy sector by continuously develop and provide the most valuable IT services and products to benefit the mining and energy stakeholders.



PT Tura Teknologi Informasi

Inspiring Technology In Mining

We endeavor to be the most valuable IT company in mining and energy sector

PT Tura Teknologi Informasi is Indonesian IT Mining company which founded to meet the requirements of worldwide mining and energy customers and committed in providing IT products and services in order to support sustainable growth of mining and energy industry.

Our vision is to become the most valuable IT company in mining and energy sector which deliver the excellence values to customers. This commitment is fulfilled by continues improvement of our core competency in IT of Mining and Energy, supported by dedicated research and development team which consist of Mining, Energy, and IT experts with international experiences.



Our Vision

Become the Most Valuable IT Company in Mining and Energy Sector



Our Mission

1. Deliver excellent IT services and product in order to support sustainable growth of Indonesian mining and energy industry
2. Support the government and industry in IT services and product in order to optimize mining and energy role as a prime mover of development
3. Bring mining and energy sector closer to the public



Our Value

Professionality, Integrity, and Solidarity



Our Strategy

1. Continuous improvement in human capital, technology and services
2. Dedicated research and development team
3. Strengthen relation with the stakeholders
4. Perform good corporate governance

Our Team

We can achieve it because our people work together with passion

Our team consists of Mining and IT experts who have national and international experiences.



Sri Raharjo

Mining Digitalization and Automation, Technology Innovation Conceptor, Mining 4.0 based Policy and Regulation, Business Strategy and Development, Global and National Stakeholder Relation



Anoko Kusuma Ari
Engineering and Art

Herdian Ganda Wijaya

Mining Engineering; Mining Technology Integration; Fleet Management System; Project Management; Mining Improvement



Istuti Apriyanti Syahrir
Technical Writer; System Analyst

Raden Bangun Hartani

Software Architect; Data Warehouse; Architect Enterprise Application with Java EE; Enterprise Resource Planning; Project Management; Full Stack Developer; Certified Ethical Hacker; ISO 27001:2013 Internal Auditor; Open Source Contributor



Deby Ramadhana
Technical Writer

Resvani

Business Administration; Mining Policy and Regulation; Government, Investor and Stakeholder Relation; Business Strategy and Development



Pitrasacha Adytia
Software Engineer; Mobile Application; Business Intelligence; Risk Management

Fikri Irsyad

Business Development; Marketing; Energy and Mineral Expert



Irvan Aji Pratama
Project Management; Process System

Yopi Ahmad Hanafi

Software Engineer; Information Technology and System; Artificial Intelligence



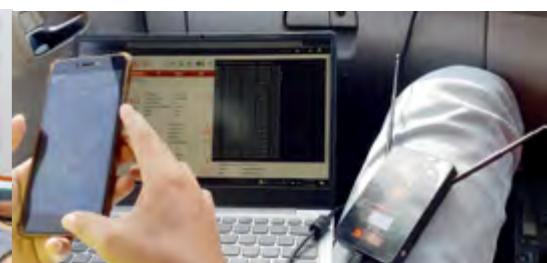
Salmawati
Numerical Modelling; Programmable Logic Controller; Telemetry System; Internet of Things

Dery Febriantara

Software Engineer; Mobile Application; Network Infrastructure



Hanif Ikhwan Pratama
Optimization Modelling; Energy System



Our Services



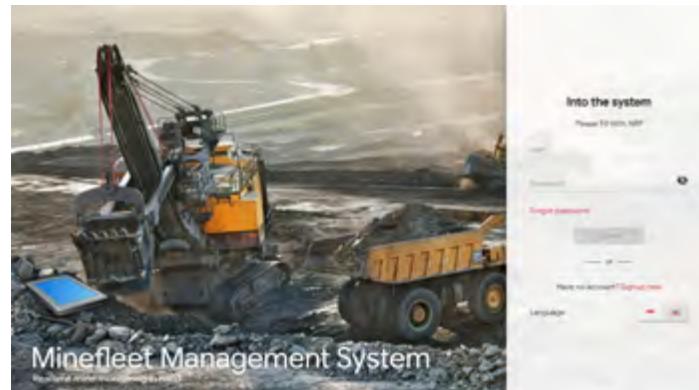
Our Products

Mine Fleet
MineOpS
E-Profiler
Mine_WS
Mine_SmartLink
OLS
Mine_TS
Mine_AirSys
TURA_HR
Mineboard

Fleet Management System (FMS)
Mine Operational System (Digital Checker)
RKAB Online
Mine Water Monitoring System
Network Link System
Online Learning System
Mine Telemetry System
Mine Air Monitoring System
HR Management System
Mine ERP System

MineFleet

Mine Fleet Management System



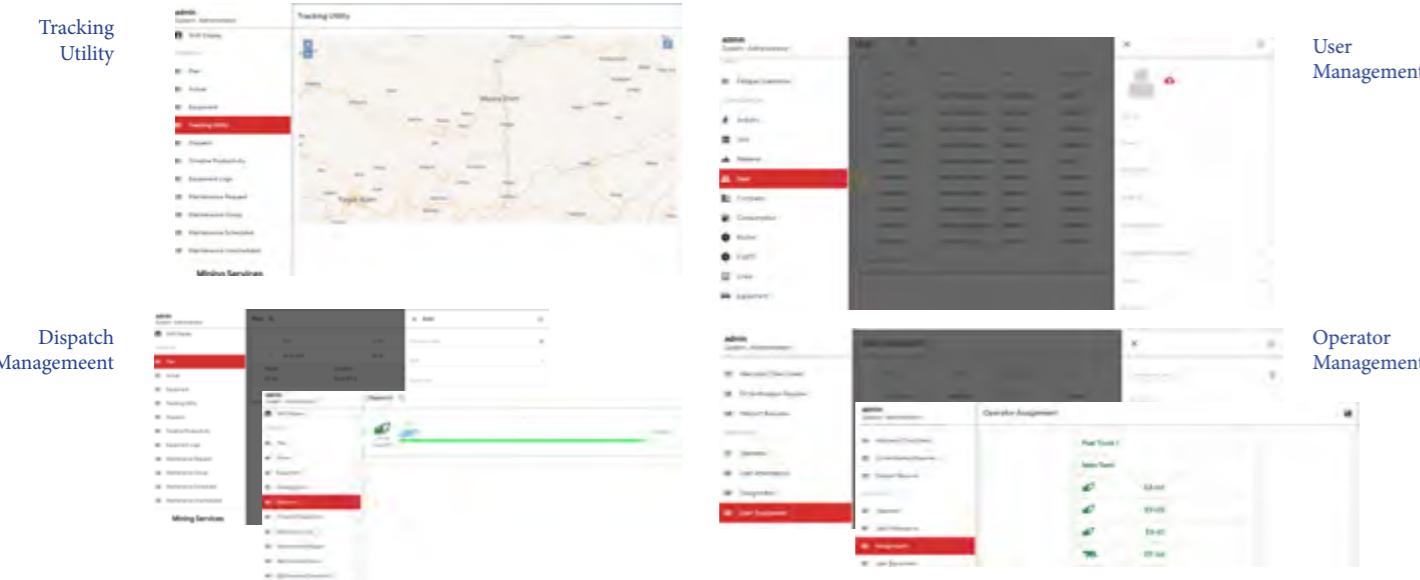
TURA MineFleet is Fleet Management System that originally developed by TURA team, it offers complete menu to facilitate mine operational, some features are related to vehicle tracking, operator management, Dispatch management, Equipment health, user management and also facilitated with attractive & complete Dashboard & report.

TURA Mine Fleet is also accommodating complete business process in the operational of mining not only focused on mine operational but also concern on safety, logistic & maintenance. This fleet management system is also supported with reliable hardware or device that will be installed to the Equipment.

Features of Functionality

- Vehicle Tracking
- Safety Support
- Operator Management
- Dispatch Management
- Fuel Management
- User Management
- Equipment Health
- Asset Management
- Reliable Device
- Dynamic Setting
- One Company One License
- Integration Opportunity
- Complete Mine Operation Module
- Attractive Dashboard

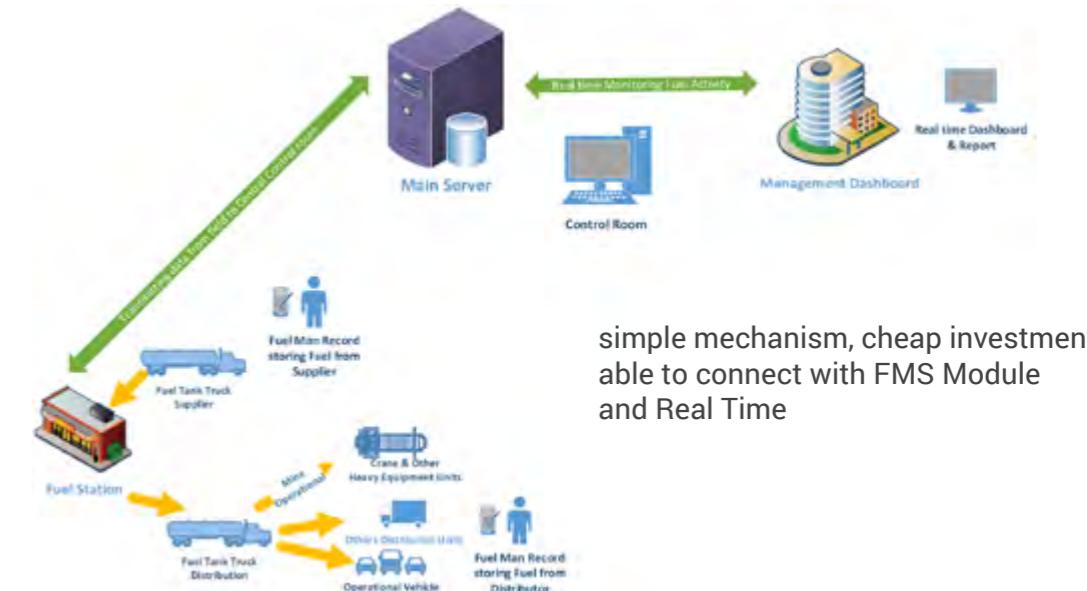
Features of System



FuelIMS

Part of MineFleet

The Concept



simple mechanism, cheap investment, able to connect with FMS Module and Real Time

Goals

- More Structured and Organized data compared to manual recording
- Real time information
- Data Inventory
- Historical Data Tracking
- Performance Dashboard Monitoring
- Improvement activity in more efficiency of fuel cost allocation

Features - Fuel MS App

- Login - Logout
- Fuel Stock
- Fuel Truck
- Fuel Unit
- Data Master
- Offline System

Fuel Management System

- Record Storing fuel from Supplier
- Record Storing fuel from Internal Storage to Truck Distributor
- Record Storing fuel from Truck Distributor to units (HE Units)
- Capture HM Units
- Capture Fuel Man and Units Operator include Driver units
- Capture Unit Identity include (Fuel Track and Units Receptient)
- Capture refueling date and time
- Inform the last store fuel Quantity
- Inform the last HM

Fleet Management System

- Record Real Time activity Units
- Record HM units
- Record Total Fuel Consumption Units
- Record production achievement

Fuel Management Dashboard

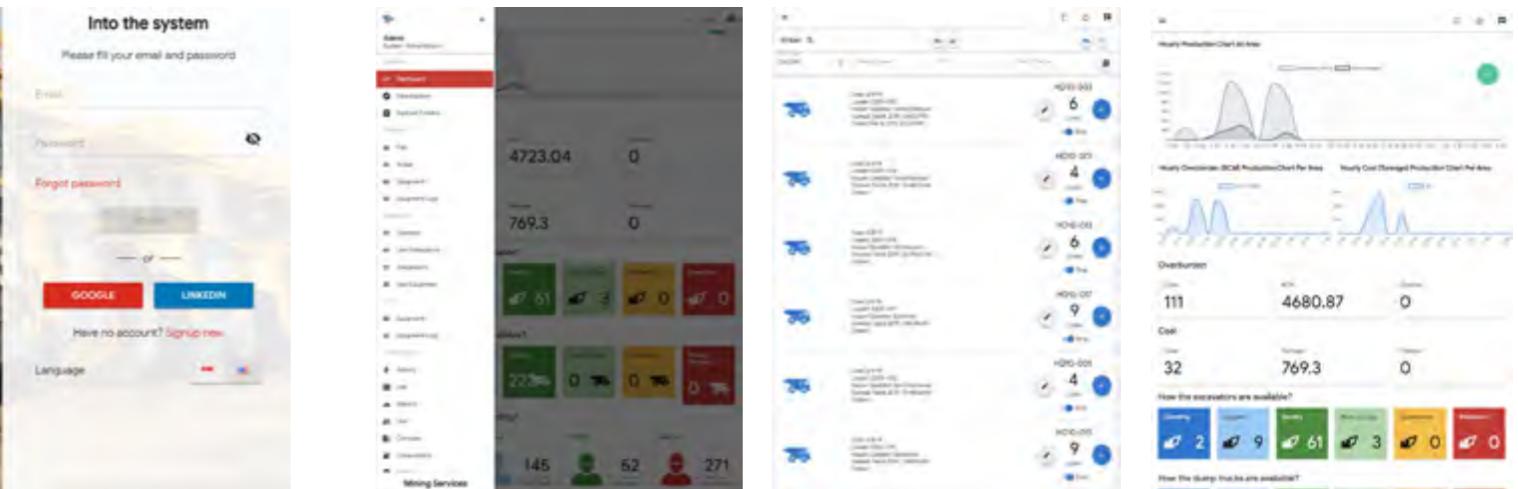
- Inform Fuel Inventory in Main Tank (Main Internal Storage)
- Inform Fuel Inventory in each fuel tank distributor
- Inform fuel left on each units
- Present Fuel Ratio of Units
- Present Units Performance based on Fuel rate consumption
- Able to show fuel operational cost if connect with fuel cost

MineOps

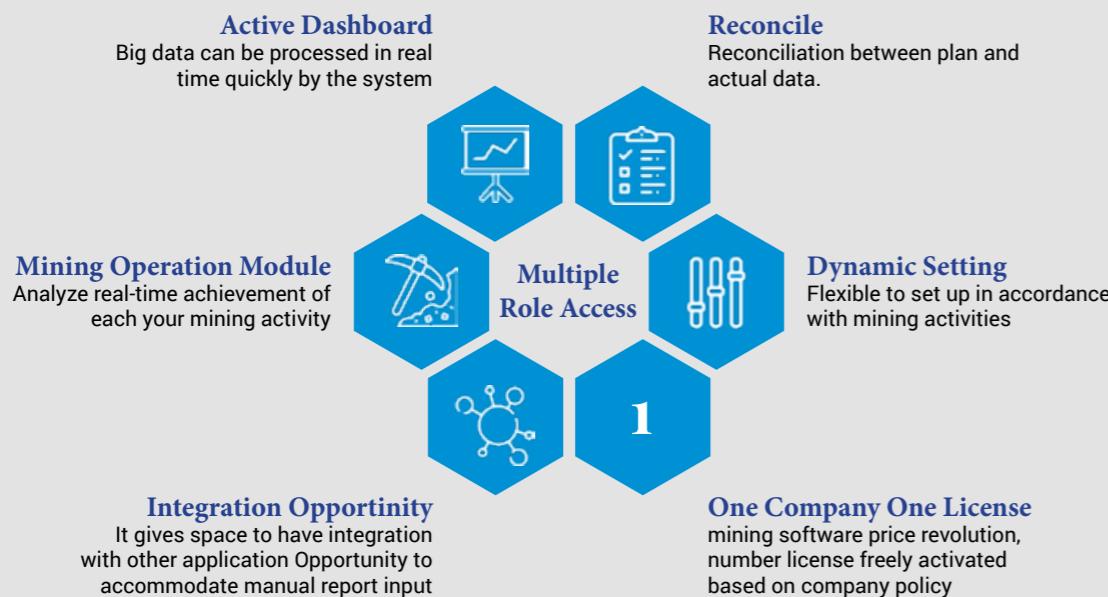
Mine Operational System

TURA MineOpS is application that basically digitalizing manual production record that conducted by Checker. Simply, Reliable, & Real time besides also facilitated with the attractive dashboard & report, & also open for the integration will give much support to the mine operational.

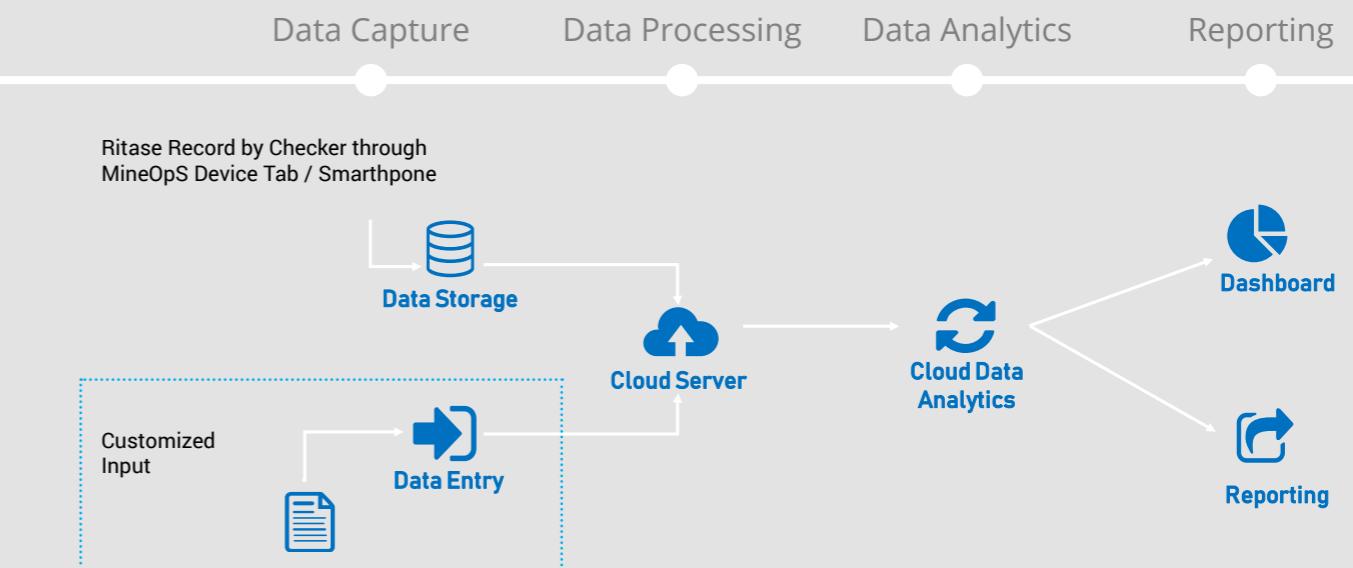
Mobile Platform on PWA & Android base



Features



Simple Flow Data



What Modules We Provides

Dashboard Real time dashboard Data explorer Data explorer timeline	: Production, OB, Coal, and Ritase (cycle) : User recapp & unit availability : Flexible Explorer Report (easy customized report), histocal production
Operation Plan (module) Actual (Module) Equipment (module)	: Unit Positioning Setting : Flexible Material adjustment : Flexibility on fleet activity setting : Flexibility on Planning for Unit Position : Simple prochcedure for cycle (ritase) recording : Digitalize the over handle report : Pick up Lost time record : Event activity record (describe time utilisation)
Man Power Operator (module) Assgniment (Module) User Equipment (module) Attendant Employee (module)	: Monitor employee's attendance and assignment : Flexible to assign operator : Setting baackup operator : Support integration to finger attendance device
Plant Equipment (module) Equipment log (Module)	: availability equipment monitoring : Handover mechanism of Breakdown to Ready Equipment, vice versa : Categorize Scheduled & unscheduled maintenance

These all are widely open customizing system & further opportunity to more enhance development, including integration with other application.

Production Dashboard Monitoring



E-Profiler

RKAB Online

E profiler is the Integrated mine reporting platform that is designed to compile many data & report such as production planning, finance & budgeting, production realization & others company planning that comply to the government regulation. It'll be also very useful in compiling RKAB document as one of the obligation that should be reported each company to the government.

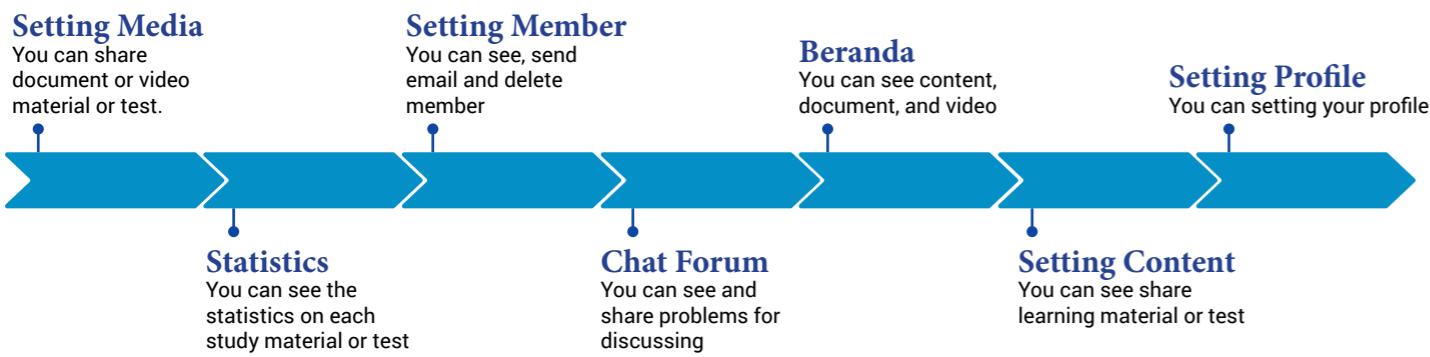
Automation in compiling report & sending the document refer to government standard, sure will more simplify the preparing process & easier the company in complying the government regulation.

TURA-OLS

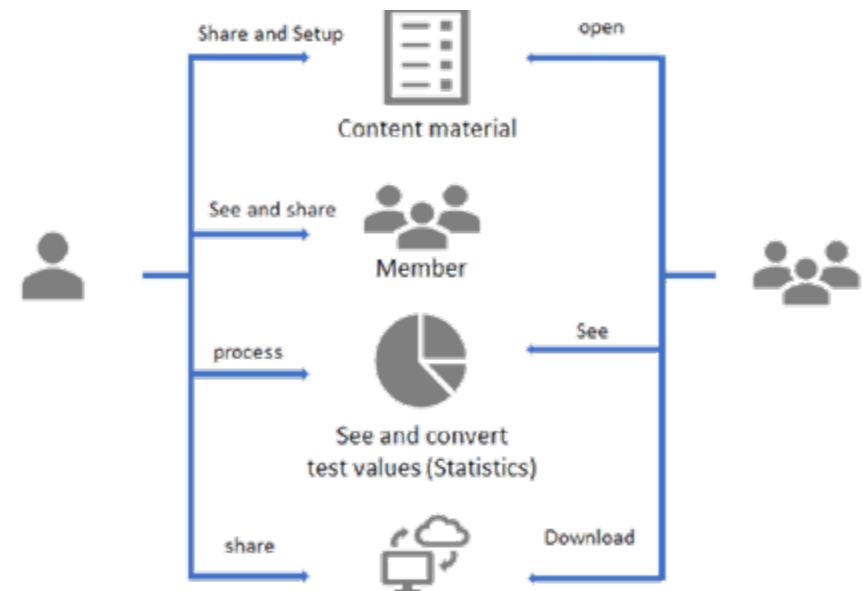
Online Learning System

Online Learning or E-Learning, is new mechanism to conduct training, testing, assessment or certification in online mode. It doesn't obligate user or members attend the class together with the trainer in the same place. It can be implemented to the several place, sure it will save more time & especially related cost. This mechanism appropriate applied in mining that commonly consist of some areas or some Department. Then some activities for example related to employee induction, employee training, renew ID or KIMPER together in some areas or Department can be facilitated with this application.

Features



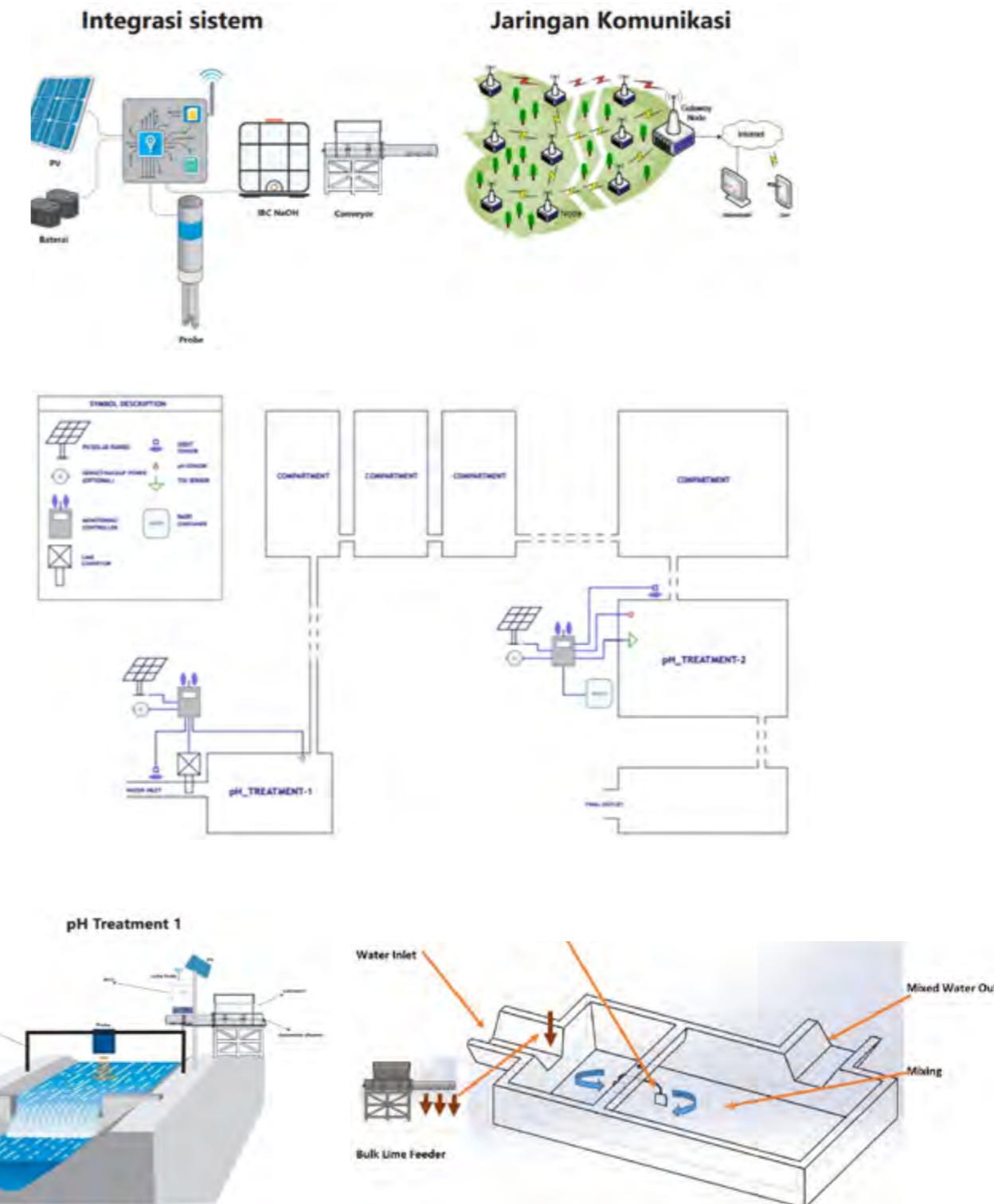
Integrated Flow Captured in Online Learning System



MineTS

Mine Telemetry System

Focus on ensuring the PH Value is in accordance with the required quality standards. The treatment applied is based on automatic control system monitoring.



TURA-HR

HR Management System

TURA HR, is Human Resource Management application that developed to facilitated the HR activity especially in managing employee. Simply, complete & reliable application, make user easy to learn. This application is very open for the integration especially integration with attendant tools & others HR management besides it's also easy to be deployed. Some features are related to management on the placement employee, salary payment, shift scheduling, overtime procedure, leave scheduling & others menu or features.

Features

Company

You can manage data company as is level position, department, salary, etc.

Administrator

You can see and edit data user

Attendance

You can see and manage history absent, absenteeism, work schedule, Shift, etc

Salary and Address

You can manage payroll data as is salary setting, fringe benefits, deductions, and employee addresses, etc

Data Master

You can manage data for education, expertise, contract, etc

Employee

You can see and manage the employee data as is employee profile, career history, etc

Overtime

You can see and manage overtime data from each employee

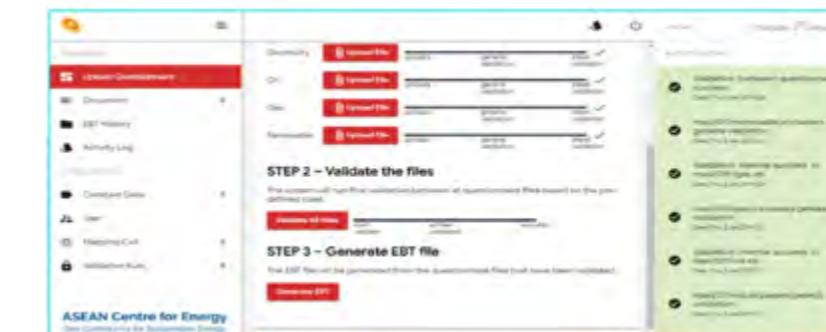
Leave

You can see and manage employee data on leave



Projects Highlight

1. ASEAN Energy Database System



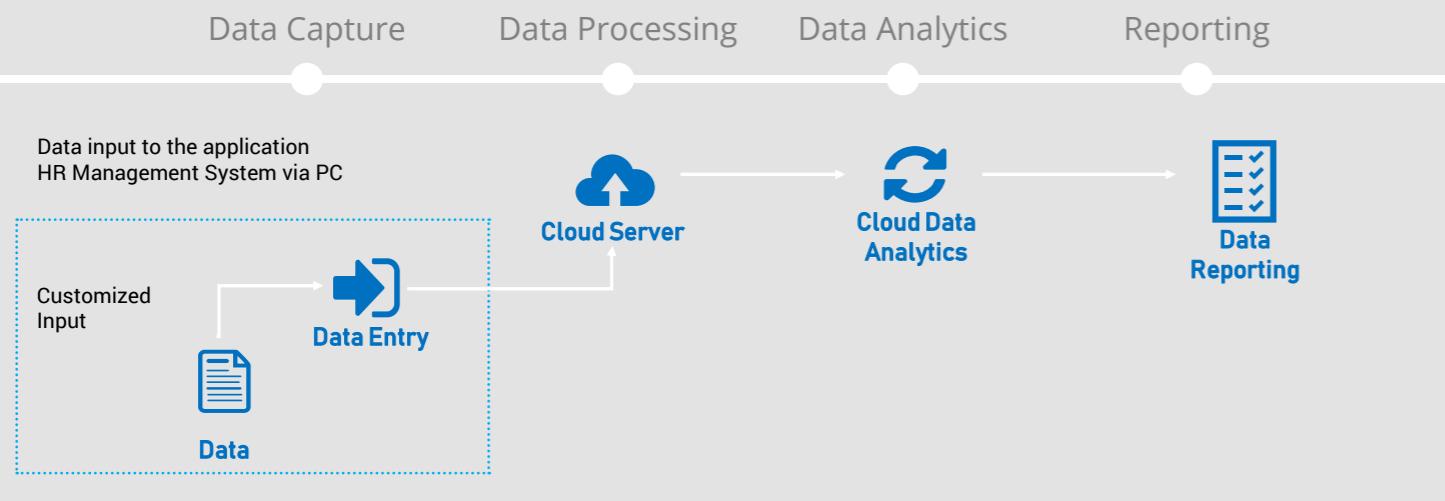
ASEAN Energy Database System (AEDS) contains information and visualisation of statistics of ASEAN Member States (AMS). In order to maintain consistency and quality of the energy data, it is important to verify the data source further utilised in the analysis process.

2. IT Assistance



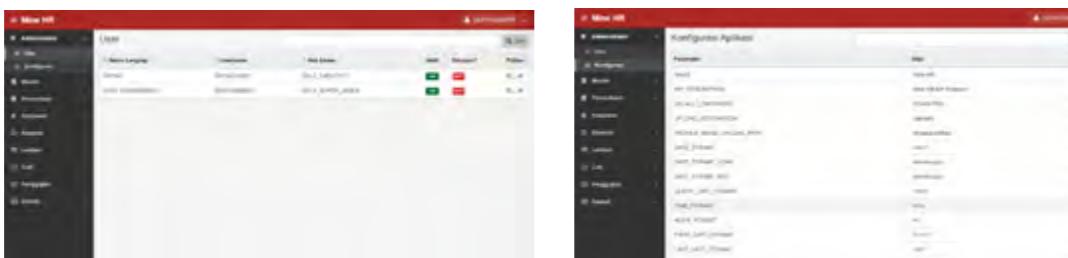
Assistance is the assistance project to guide the IT team, to build data hub for the operation team, with transform the manually process production record on datasheet by checker into Digital. It gives real time production report on the point of view Checker.

Simple Flow Data



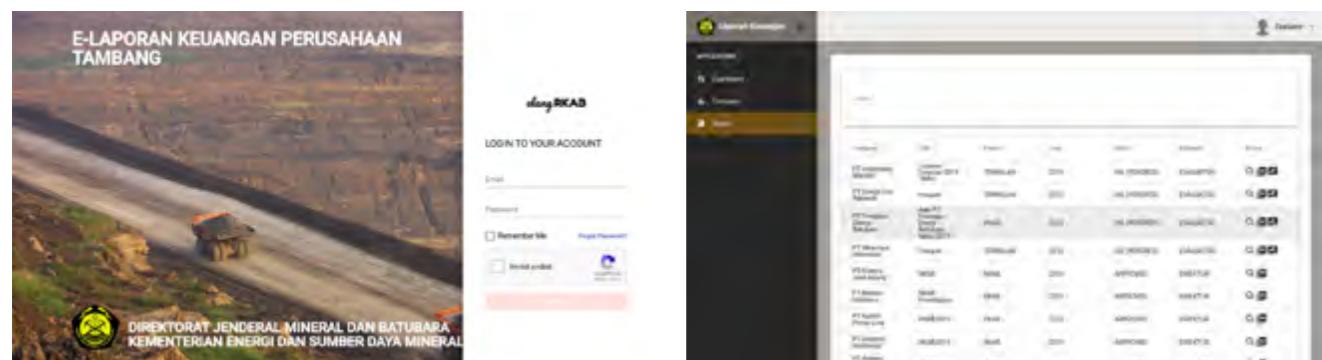
Administration

User & Configuration feature



3. RKAB (Workplan & Budget) Online System

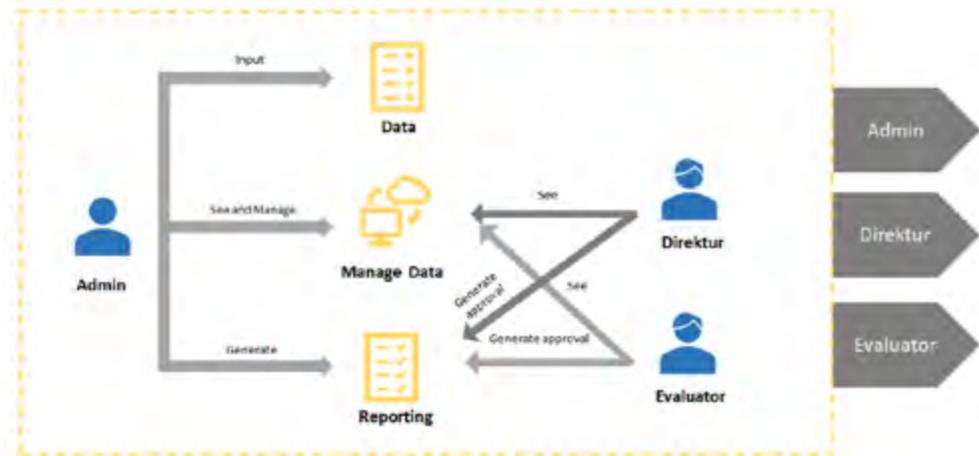
This application is developed to accommodate report on financial material related to submission of RKAB from all mining companies, it has been adjusted with actual report including official matrix that has been stated by government. This application is made with simply procedure, one of them with accommodate generating data from Excel format.



Features



Integrated Flow Captured in E-RKAB



Team Portfolios

SOX – PT Satria Bahana Sarana (Subsidiary of PT Bukit Asam)	IT Assistance Project Developing Data Hub System SBS Operation Excellence
Ministry of Energy and Mineral Resources (ESDM)	RKAB (Workplan and Budget) Online System
ASEAN Centre for Energy	Construct ASEAN Energy Database System (AEDS)
Pemuda Berkarya Manunggal	Develop Value Chain Management System Real time distribution monitoring of Coffee Stock from the origin farmer till the customer
Directorate of Energy, Mineral Resources and Mining, Ministry of National Development	Talent Management System Human Resources Talent Recruitment System for Bridging Academy and Company
Ministry of Energy and Mineral Resource (ESDM), Indonesia	Renewable Energy, Oil and Gas Portal System
Energy and Mineral Resources Agency, West Java Province	Coal Mining Report Monitoring and Performance Review System Part of Mining ERP Grand Design
PT Satria Bahana Sarana (Subsidiary of PT Bukit Asam)	Mining Permit Information System
E-Profiler E-RKAB	Fleet Management System Develop & enhance the existing MineOps application that has been applied in PT SBS called as to become complete Fleet Management System
Auto Treatment PH Monitoring	E-Profiler E-RKAB Develop master online RKAB module, to facilitate & simplify user (mining company) in compiling data related to preparing submission of RKAB Draft
Auto Treatment PH Monitoring	Develop an integrated real time PH Monitoring, combining with Auto Control System, where system would automatically adjust liming feeder, include NaOH spreader to normalize PH value. Effective, Efficient & Optimal result in normalize of PH Value become the indicator of success criteria in deployment Auto Treatment PH Monitoring System



ASEAN Centre for Energy
One Community for Sustainable Energy



**Kementerian PPN/
Bappenas**



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