



INTERNATIONAL OPERATIONS & MAINTENANCE CONFERENCE  
IN THE ARAB COUNTRIES

UNDER THE THEME

**"MANAGING MAINTENANCE WITHIN INDUSTRY 4.0"**

CONICIDE WITH THE 16<sup>TH</sup> ARAB MAINTENANCE EXHIBITION

# STEPS OF MAINTENANCE CONSULTANCY

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Executive Manager of Shareford Consulting Company



# 4.0

# Content



**Introduction**



**Main  
business**



**Consulting  
structure**



**Software**



**Value adding**

# Introduction of our Consultancy



## Vision

To be the leader of smart maintenance



## Strategy

Focus to maintenance, create value for enterprise through consulting + software service.

## Mission

Take root into factory  
Serve factory  
Promote factory



## Quality Policy

Scientific, deliberate  
accurate service



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**Respect, Identity, Caring, Sharing, Gratefulness, Responsibility**

# Our Consulting Team



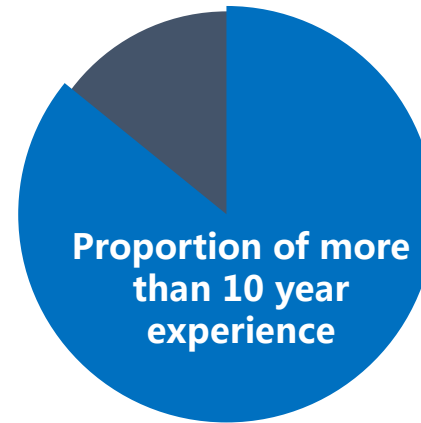
100% full-time consultant;



More than 40% with 20 years plant experience ;



More than 90% consultants with more than 2 different backgrounds



80%



More than 30% with English consulting experience



Headed by Prof. Li Baowen, and Xu Baoqiang, with rich theory and experience



# Some Clients



# Some Clients



# Our Academic Partners





# A penetrating study on maintenance issues is the precondition for an excellent maintenance consultancy

We publish 1 or 2 books each year

## Works on Maintenance

- ✓ Published more than **50** books on maintenance
- ✓ Total publish quantity up to **1 million** copies ;
- ✓ 《The Man-Machine System of Enterprise》 was published by American Academic Publisher , in **English.**

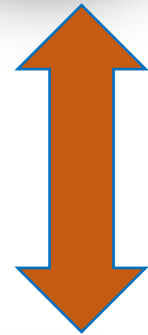


# The Main Structure to put our Commendation or System into Practice



**Standard Process**

Implement through a normalized process



**Personnel Training**

Personnel training is from the beginning to the end



Improve KPI is the target

# Main Steps of consultancy

## 2. Framework Design

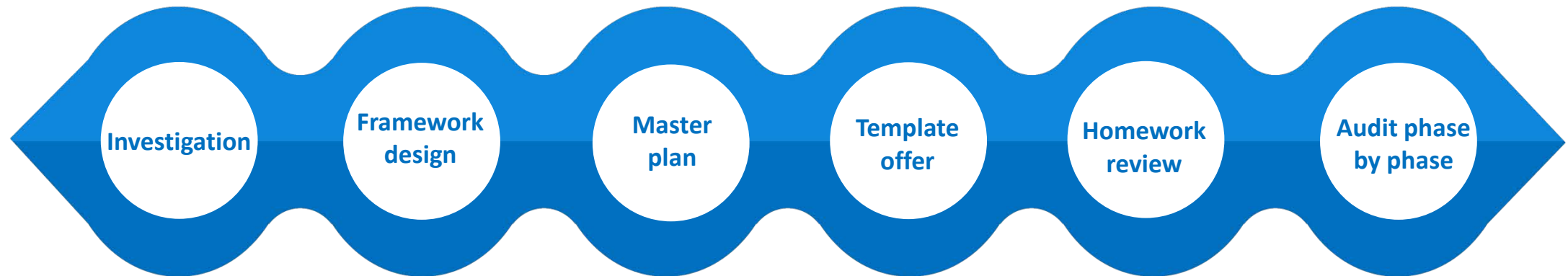
Analyze the data, different options, recommend the most appropriate options or solutions along with an implementation roadmap and expected outcomes, and *obtain an acceptance decision by the client*.

## 4. Template Offer

The clients are divided into 3 levels, for the lowest, the consultant should offer some feasible tools or template to help them carry out the issue of management such as standard, process, diagram or flow chart. For the highest, some creative space should be remained for them.

## 5. Homework Review

In each phase of service, the consultant should assign some homework for clients to fulfill, and make a review, check the progress next time. If some changes or difference appear, the consultant should solve them by sufficient communication and resource calling.



## 1. Investigation

To understand the business and environment of the client;  
To understand the client's current problem and concern.

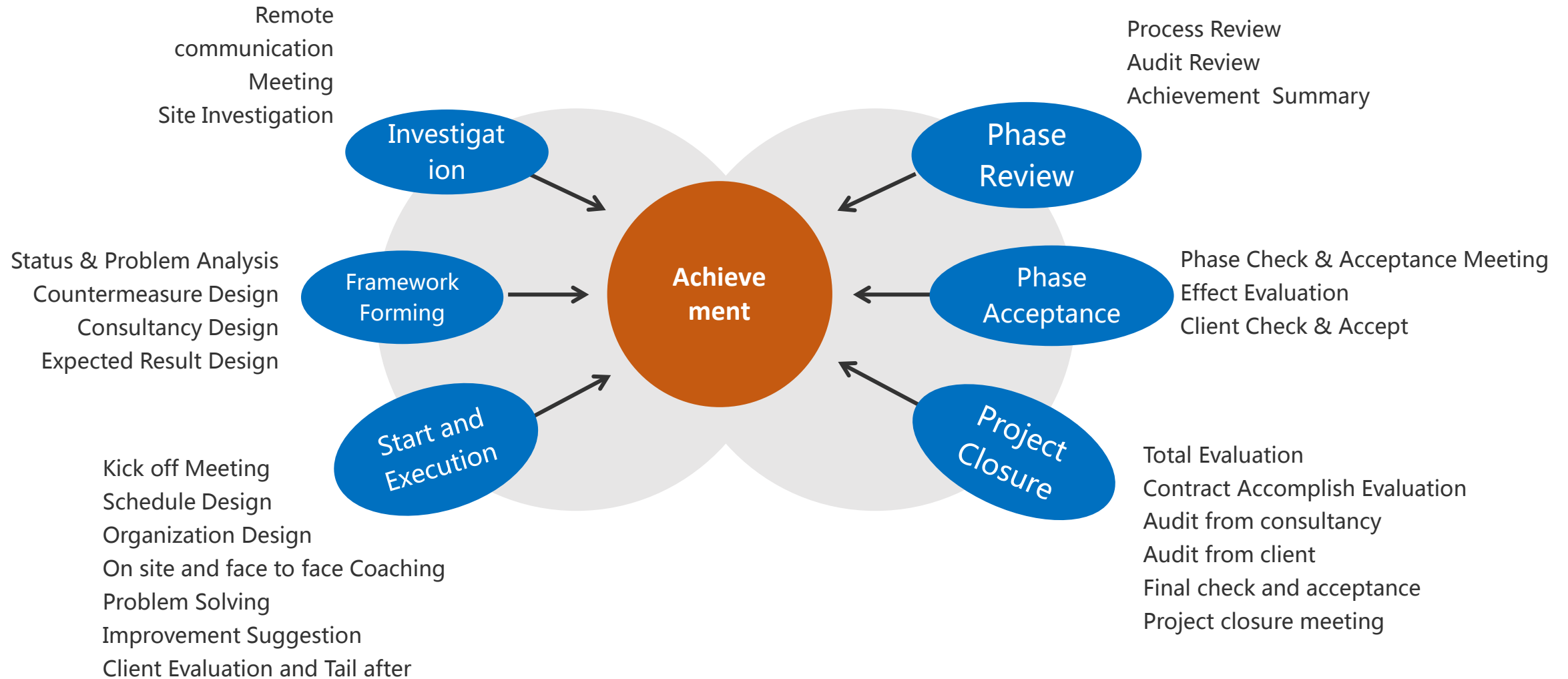
## 3. Master Plan

Includes execution roadmap, schedule, process execution content, mile stones, phase audit, resource commitment, responsibility of constancy and clients, change control, risk and quality management, KPI outcomes measuring.

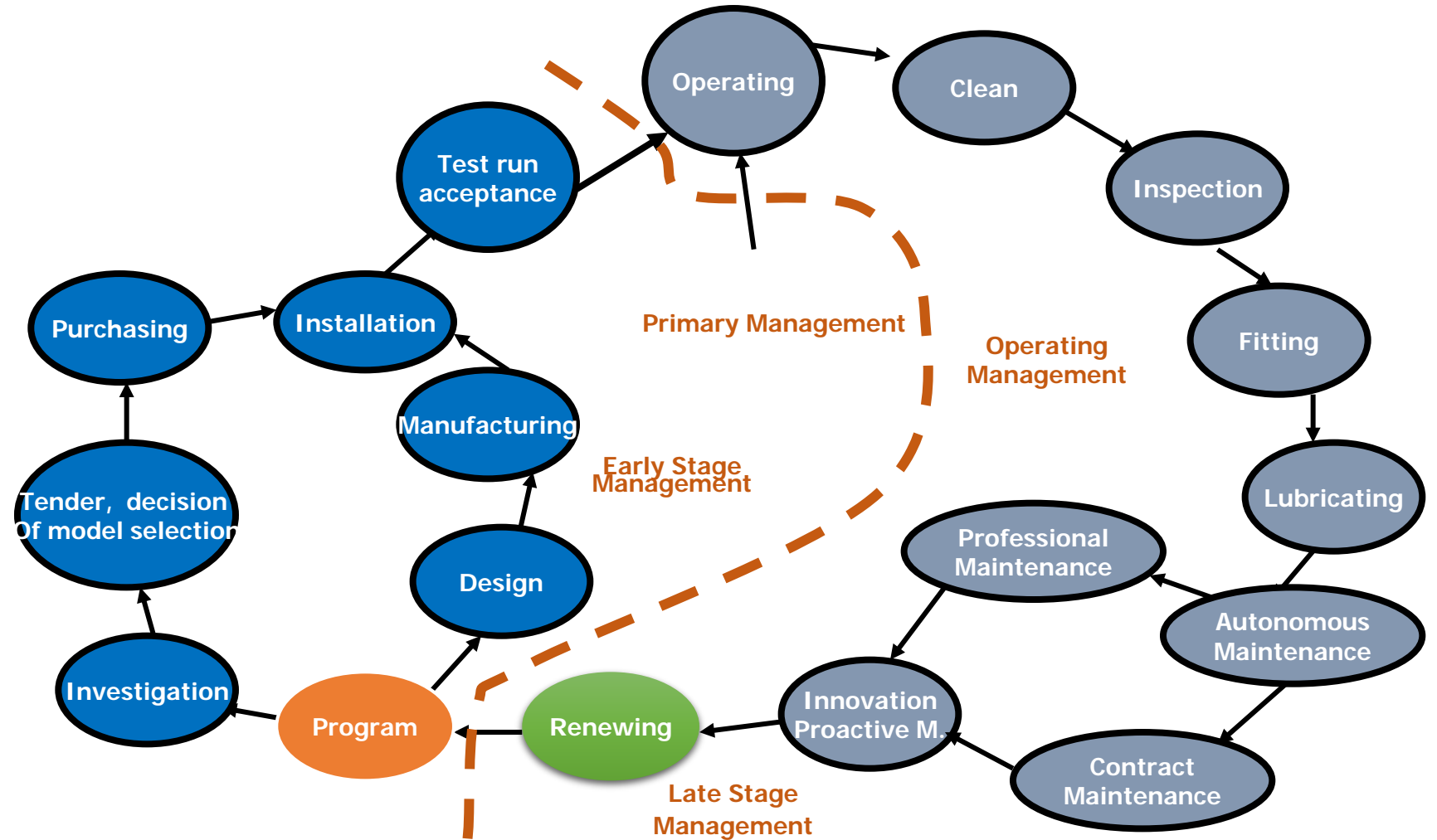
## 6. Audit Phase by Phase

After each consulting phase, including the closure of the project, following content should be audited: phase target fulfilled, process or plant effectiveness, team performance, client satisfaction, as well as the innovations.

# Mature Project Execution Flowchart



# Main Business: Direct the Life Circle Maintenance Management



TnPM——20 Years Practice , 20 years Innovation

## Total

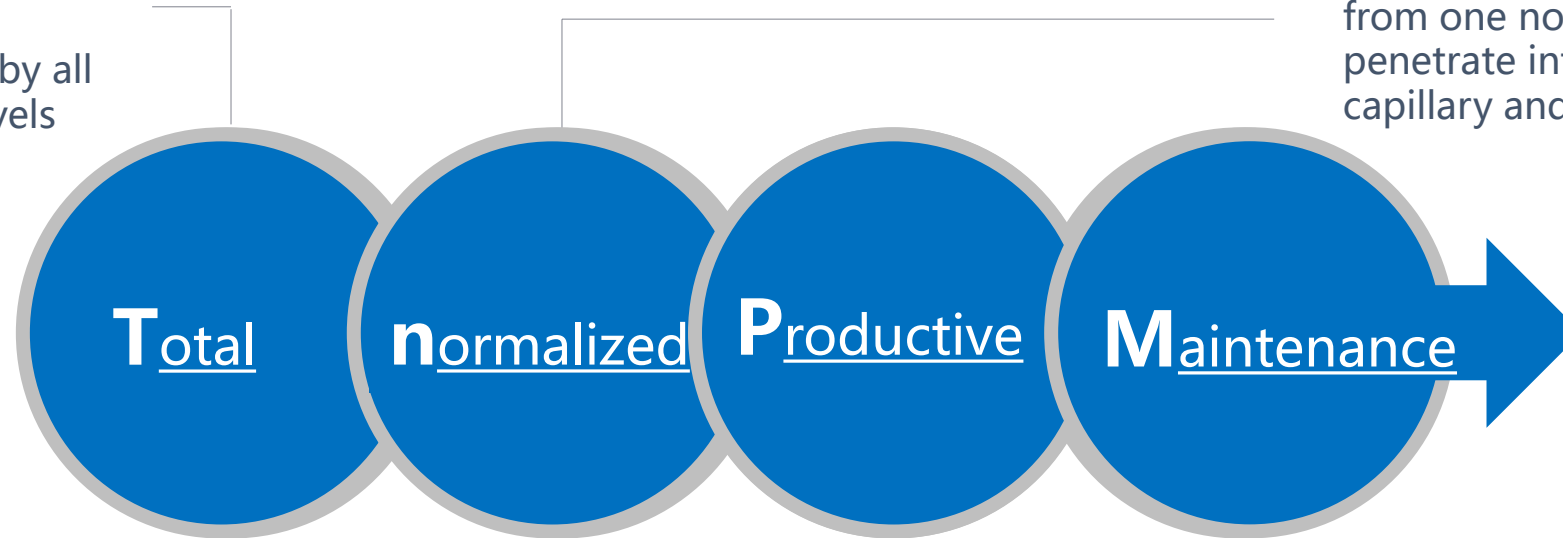
### The foundation of TnPM

Life circle maintenance management involved by all departments and all levels

## Normalized

### Carrier of TnPM

From standard to another, from one norm to another, penetrate into the blood capillary and nerve endings



## Productive

### Main target of TnPM

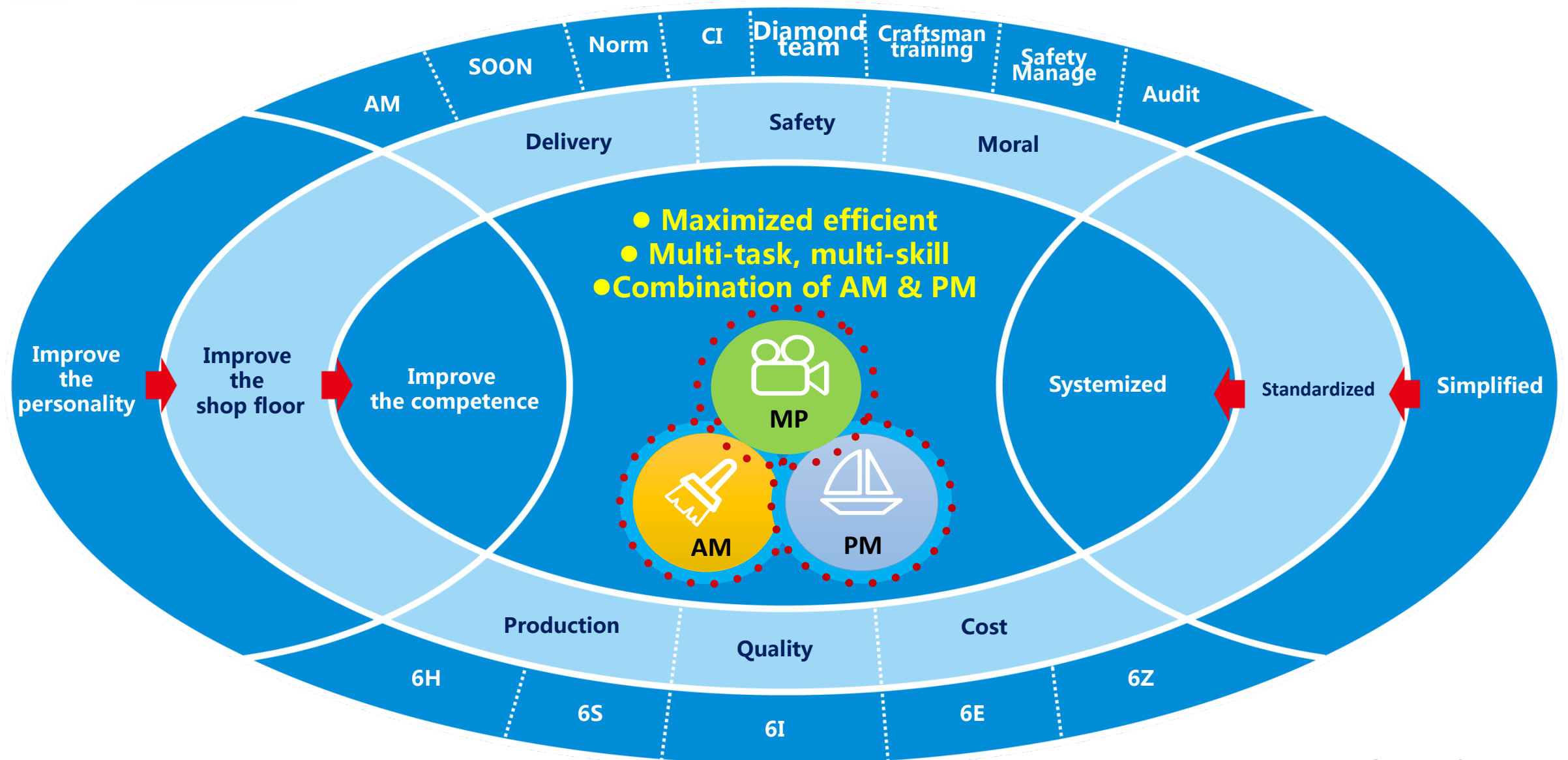
Related to all KPI, such as OEE, TEEP, MTBF, MTTR, as well as the ROI of maintenance, from input to outcomes

## Maintenance

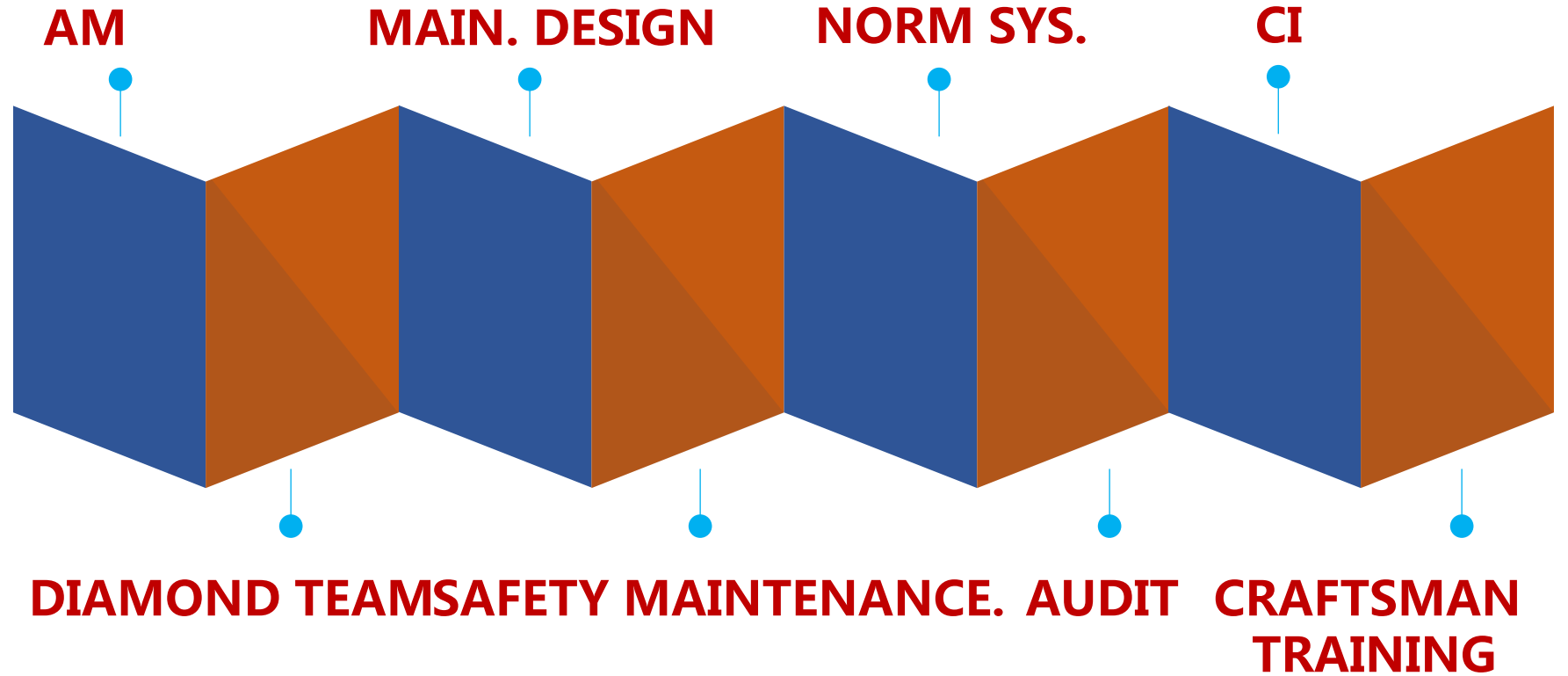
### The concept and process of TnPM

Combination of autonomous maintenance and professional maintenance, combination of internal and outsourced team

# Main Business: Implement TnPM System

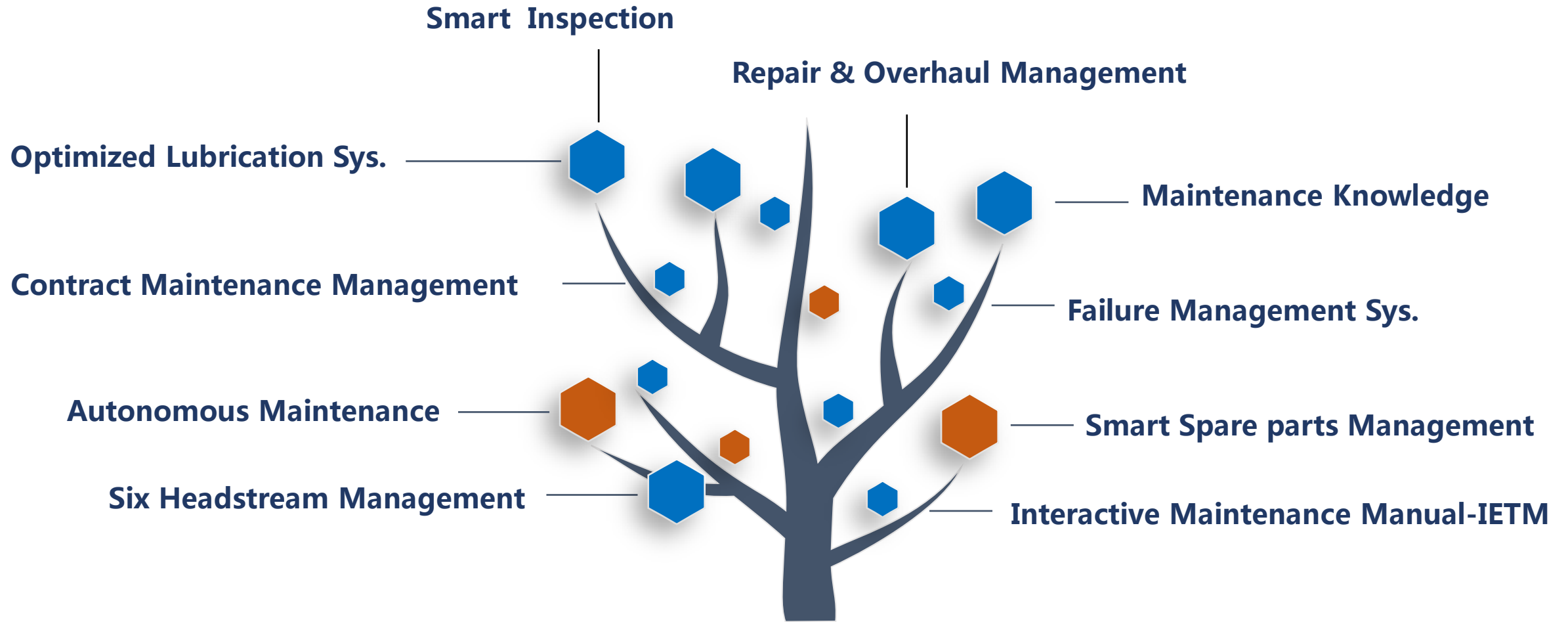


# Main Business: Implement TnPM System

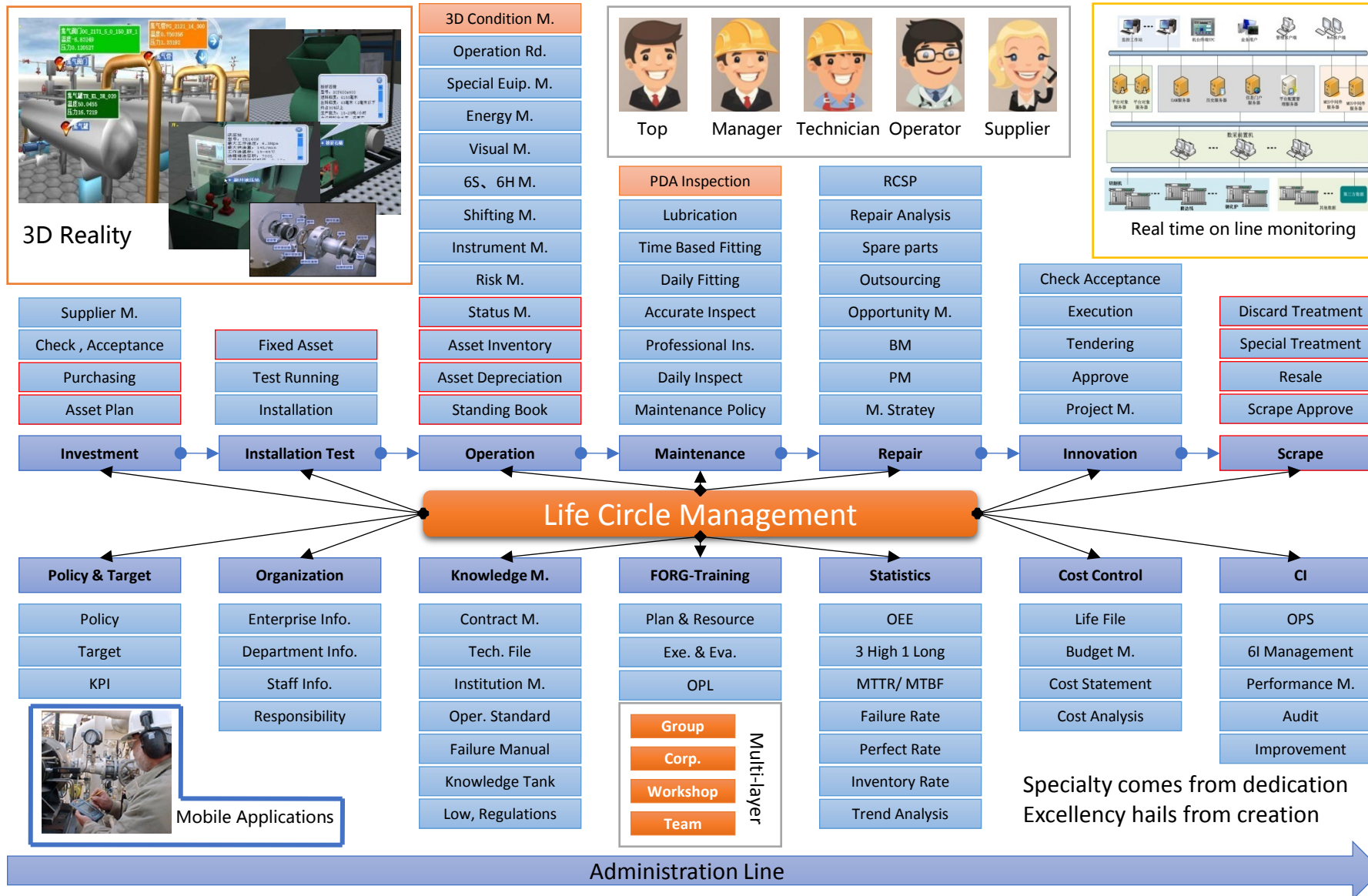




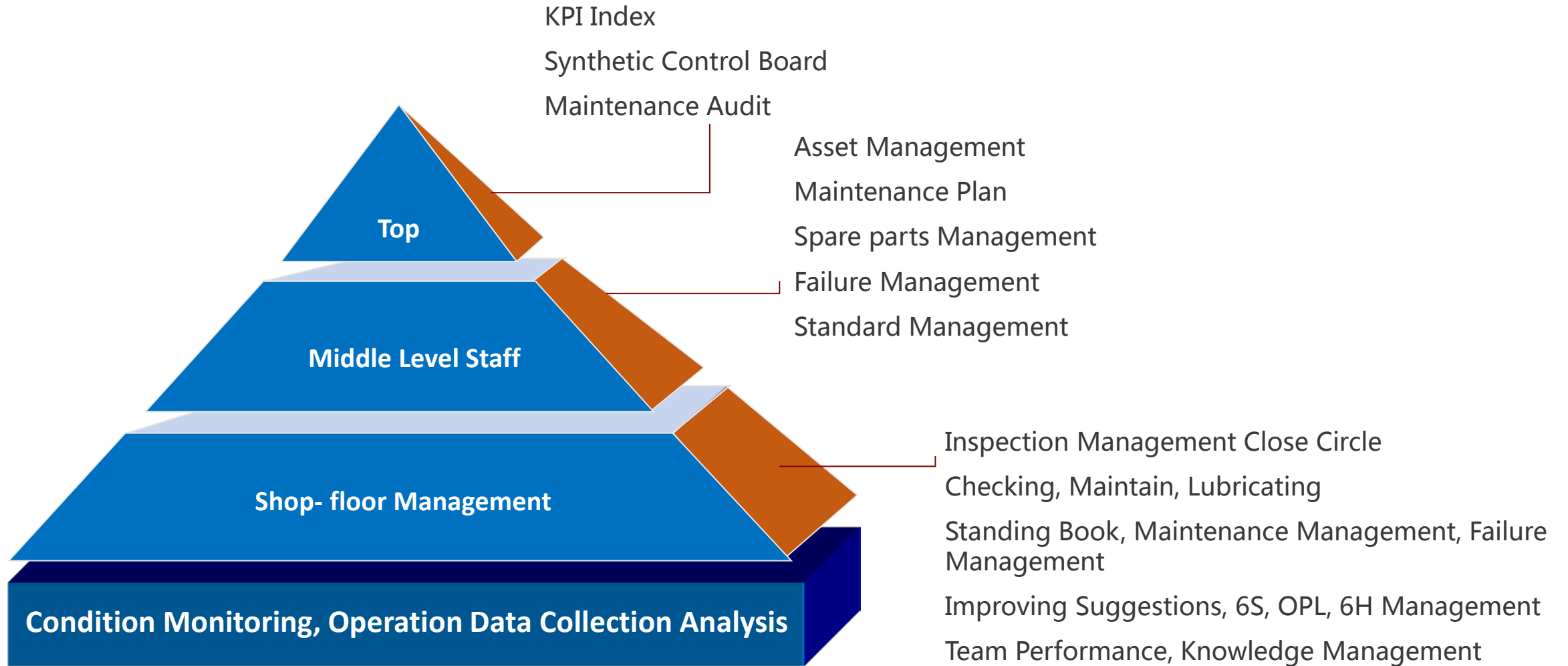
# Our Consultancy is supported by our Information System



# The Total Framework of Information System



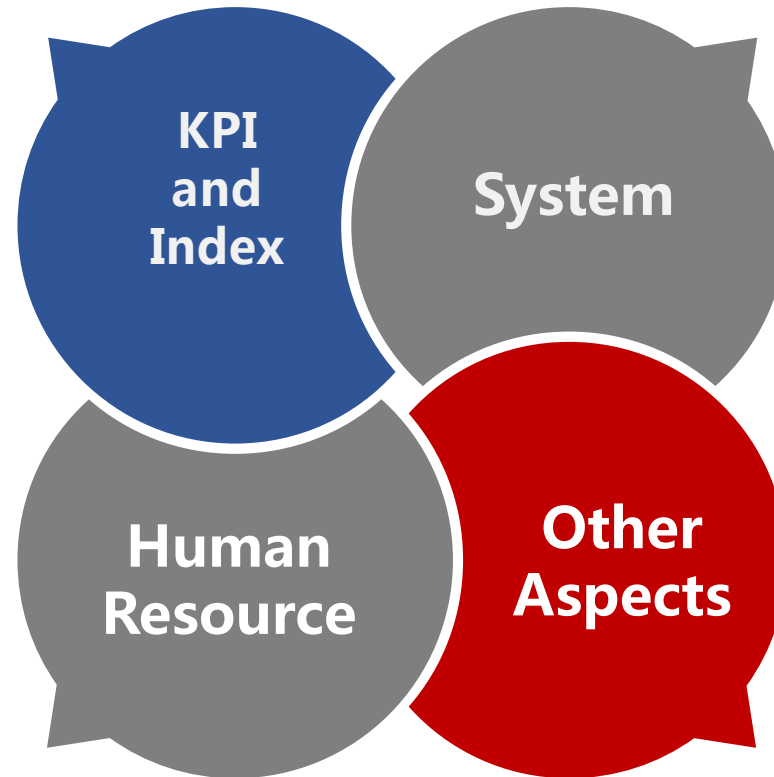
# Information System will satisfy all level's Requirement





The improvement of KPI of maintenance, especially, the progress of ROI;

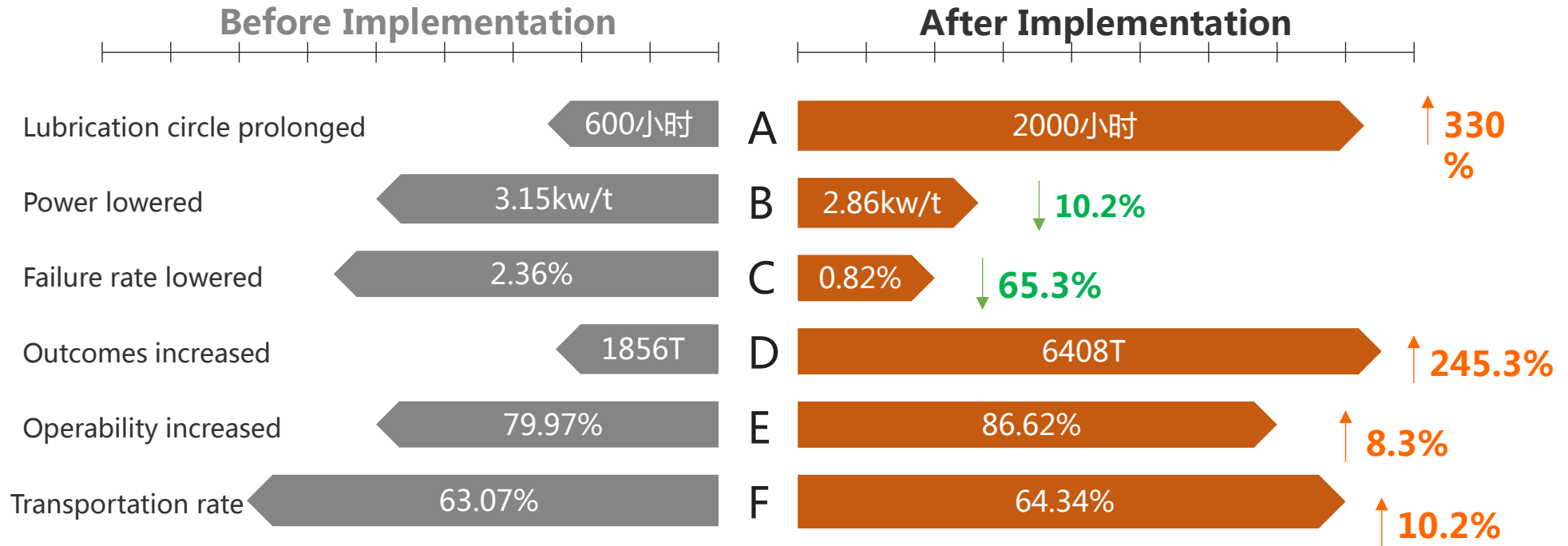
The obvious promotion of the team member's quality;



The optimize of system and institution solidified by document;

The following progress of QHSE.

## KPI improvement ( Case of a steel mine )



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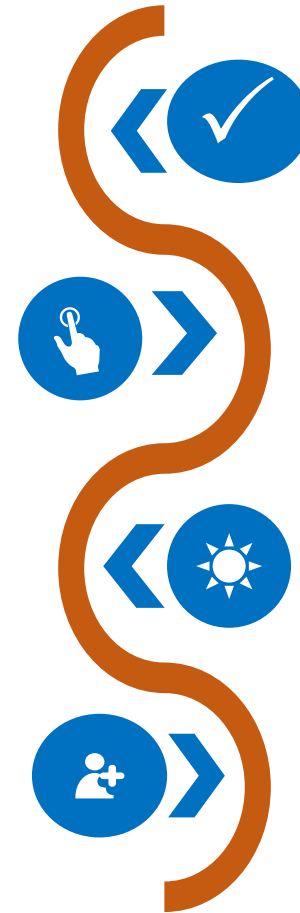


## Process

- Process Effectiveness
- Process Improvements
- Total Achievement of the Project

## Staff

- Level of OPL and OPS
- Promotion of Skills
- Capability to solve problems
- Satisfaction to the Project



## Innovation

- Innovation (development of new services)
- New systems and Concept
- New Methodologies

## Mobilizing

- Team Performance
- Utilization of Resources
- Team Building and Mobilizing





## Erdos Power & Metallurgy

Vice President Mr. Ji Xiaochun

We have the confidence to Shareford, it is an innovation to implement TnPM and related information system for our power plant and metallurgy plant. From 3 year' s striving, the progress both from KPI and employee are all obvious.



## Hengan Group

Assistant CEO & Chief manager of CI, Mr. Li Guang

Hengan is the biggest paper for daily use manufacturer in China. TnPM is feasible for the new operating mode of our group. After 2 year' s implementation, we set up the confidence to Shareford. The foundation has established and many aspects is in progressing. It is helpful also to smart manufacturing of our group.



## Qinghai Salt Lake Corporate

Vice CEO Mr. Yu Qiuping

The level of maintenance management is increased a lot after we cooperate with Shareford. It is important to carry out our target, to build up a first class garden of magnesium, lithium, and potassium in the world.



Q & A

THANKS



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4.0

# Thanks

# Questions and answers !

Welcome to our webpage :  
[www.tnpm.org](http://www.tnpm.org)



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Specialty comes from dedication  
Excellency hails from creation

**Leader of Smart Maintenance**