

## “The Company OSRAM “

OSRAM is a multinational lighting manufacturer with headquarters in Munich, Germany. It is one of the world's two leading light manufacturers in the world. The company covers the entire value chain from components to electronic control gears as well as complete luminaires, light management systems and lighting solutions.

OSRAM was founded on July 1, 1919 by the merger of the incandescent lamp manufacturing activities of AEG, Siemens & Halske AG and Deut.Gasglühlicht-Anstalt (Auer - Gesellschaft).

The OSRAM brand was registered on April 17, 1906 in Berlin by the Auer-Gesellschaft. At that time, Osmium and Wolfram were needed to produce filaments. The company name: OSRAM Werke GmbH was created combining the names of these two materials. The company logo is a symbolized lamp, which is not only the universal symbol for light but also represents good ideas.

On July 8, 2013, OSRAM was spun off from Siemens and listed on the Frankfurt Stock Exchange.

More than 70% of OSRAM revenue comes from energy efficient products. The company's business activities have been focusing on light for over 100 years.

OSRAM is a leading player across for classic lighting as well as new technologies.

With LED-based products making up a share of about 46 percent of the total turnover, the company is setting trends with regard to technological changes in the lighting market.

The expenditure for research and development is at approximately 7 % of the turnover.

OSRAM is the world's number one supplier of automotive lamps and LEDs for vehicles.

OSRAM is also one of the market leaders in the field of electronic control gear for lamps and Electronic Drivers for LED systems.

Business with optical semiconductors is growing rapidly and has taken on major strategic importance.

At their site in Garching / Munich, OSRAM develops electronic ballasts to dim fluorescent lamps , electronic Drivers for LED Systems and components for light management systems. The daughter Company Siteco, a leading producer of technical indoor- and outdoor lighting and client oriented lighting solutions, is stationed at the site in Traunreut.



Figure 1 OSRAM company logo

## PROJECT Vorschlag Nr. 2

### Arbeitstitel

#### Implementation of Cost Analysis and Optimization Software Tool for Electronics

#### Ausgangssituation / Randbedingungen / Zielsetzung

Improve product value and reduce total cost for OSRAM is a major goal of Cost-Engineering. Target is to enhance the approach of strategic cost analysis with specific technical expertise to improve product value and cost, by applying a dedicated set of cost and value levers.

Benefits for our business:

- reduces material cost
- provides production technology expertise
- improves supplier productivity
- collaborates with cross-functional partners in design optimization

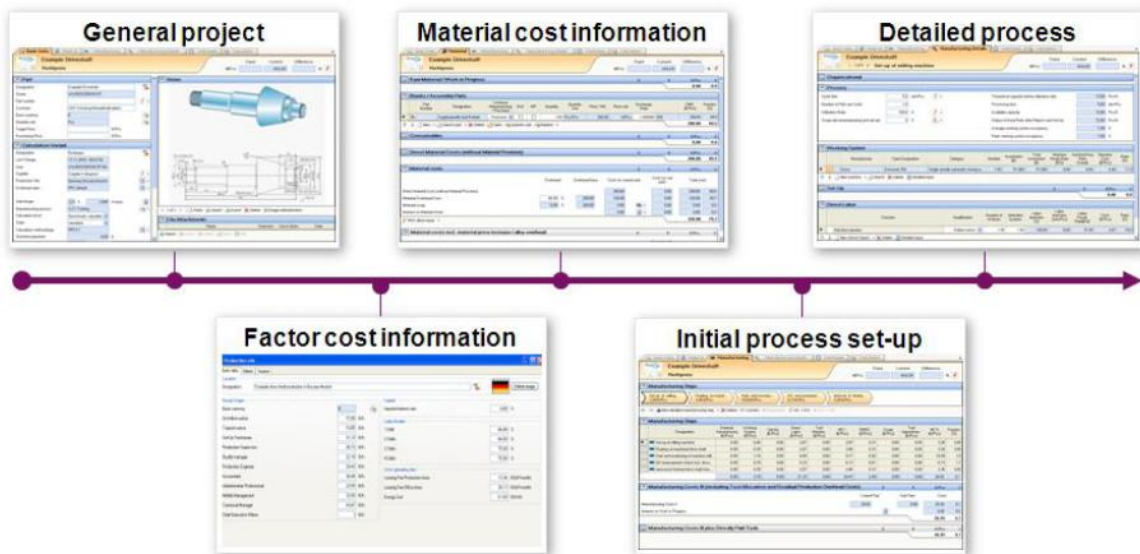
The Cost Analysis and Optimization approach provides cost transparency in all details of the manufacturing process – this serves as a basis for targeted optimization of the suppliers, productivity, our product specification and help to push negotiations based on real prices instead of market prices.

Products and process costs must be evaluated in detail before starting new product proposals. This has to be done always under the consideration of TCO (Total Cost of Ownership) with the support of the **Cost Analysis and Optimization Software Tool which need to be implemented within that IPA Project for Electronics.**

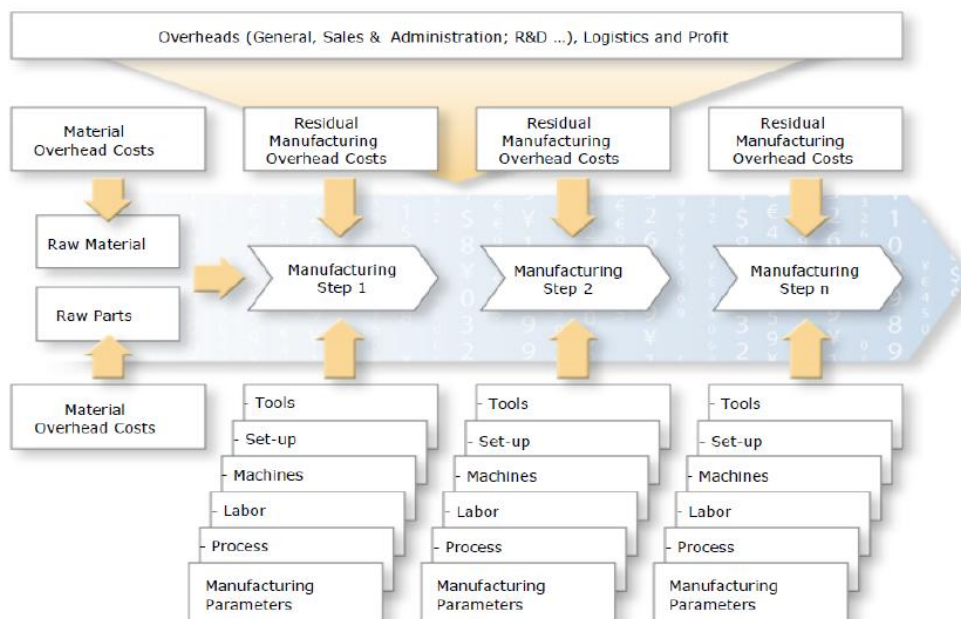
### Arbeitspakete

#### Implementation of Cost Analysis and Optimization Tool for Electronics

- Analyze Current available Cost Analysis and Optimization Tool
- Create Overview for Data need to put in the tool for Product Cost Management:
  - General Project Electronics
  - Material Cost Information
  - Detailed Process Information
  - Factor Cost information ( Location, Salary, ...)
  - Initial Process Setup



- Define Template to fill Product Requirements, Material Cost & Process Data.
- Definition of Alignment-Process of Product Requirements vs. Manufacturability between R&D & Manufacturing
- Calculation Build up within the Software Tool with Manufacturing Steps



- Prepare & Define Standard Cost-Material-Process comparison TCO Output of the Software tool
- Evaluate & Negotiate with external Suppliers detailed Output Results of the Tool based on Processes defined
- Align with OSRAM R&D and Purchasing on test plan of the software tool (based on existing product approval process) / Setup of Test Matrix
- Prepare Management Presentation

### **Lösungsansatz / Aufgabenstellung**

#### *Phase 1:*

Analyze: Current available Cost Analysis and Optimization Software Tool, Define Templates to fill Product Requirements, Material Cost & Process Data, Cost Calculations for TCO Decision

#### *Phase 2:*

Execution: Output Definition for Comparison, Evaluate & Negotiate with external suppliers, base on Sample Products, Final Presentation

### **Standort**

OSRAM / Garching bei München

Unterschiedliche Lieferantenbesuche

### **Besondere Anforderungen**

MS-Produkte (vor allem Excel, Powerpoint)

Gute physikalische Grundkenntnisse

Offen für neue Software Applikationen

Ideale Teamgröße: 2-3 Studierende