

# Business Requirement Document (BRD) & Plan of Action

Client: Varsha Forgings Pvt. Ltd.

**Project:** Varsha Forgings Pvt. Ltd. - Automotive Components Forgings OEM & Tier-1 Suppliers  
(Commercial Vehicles)

Business Vertical: Manufacturing - Forging & Industrial Components

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## Company Introduction

**Shivit Technologies Pvt. Ltd.** is a trusted Indian IT company with over a decade of experience in delivering enterprise-grade solutions. We specialize in ERP, procurement, and financial automation tailored to manufacturing, export, and service-based industries. Our robust Procure-to-Pay (P2P) and Expense Management Systems are designed for scalability, compliance, and deep process automation.

## Why Shivit Technologies?

- Proven track record of successful ERP implementations across industries
- Strong domain expertise in manufacturing, hardware exports, and process industries
- Customizable platforms built on modern cloud-native architecture
- Agile delivery with Indian support and global deployment capability
- Competitive pricing with high ROI and transparency

This Business Requirement Document (BRD) outlines the high-level business needs and technical solution approach .

## 1. Purpose of the Document

The purpose of this document is to capture and formalize the business requirements discussed during the requirement discussion call with Varsha Forgings Pvt. Ltd. This BRD focuses on **Procurement, Inventory, Production Planning, Work-in-Progress (WIP) tracking, and ERP automation**, and defines the expected solution scope for **phased ERP implementation**.

## 2. Business Overview

Varsha Forgings Pvt. Ltd. is engaged in the manufacturing of forged automotive components catering to **OEMs and Tier-1 suppliers** in the **Commercial Vehicle (CV) segment**.

Key business characteristics include:

- Steel constitutes approximately **70% of total turnover**
- High dependency on accurate:
  - Procurement planning
  - Inventory visibility
  - Production loss analysis and WIP valuation

The organization aims to **reduce dependency on manpower** and improve operational efficiency through **technology, automation, and AI-assisted decision making**.

## 3. Current System Overview (As-Is)

### 3.1 Sales & Order Management

- RFQs received from customers
- Quotations shared and negotiated
- Purchase Orders received
- Design approval and sample lot production
- Regular production and dispatch

### 3.2 Production Process Flow

Production follows a **sequential, forward-only routing process**:

1. Raw Material Receipt & Testing
2. Cutting (weight-based as per part)
3. Forging (machine-dependent)
4. Heat Treatment
  - Hardening
  - Tempering
  - Normalizing / Annealing
5. Grinding & Magnaflux (for critical parts)
6. Dispatch

**OR**

1. Machining (CNC / VMC)
2. Final Dispatch

**Notes:**

- No backward movement between stages
- Production loss is calculated by comparing **cut quantity vs final dispatch quantity**
- Stage-wise rejection and loss are not formally tracked

### 3.3 Job Work Process

- In certain cases, customers provide raw material
- Heat treatment stage may be skipped
- Process flow: **Forging → Direct Dispatch**

### 3.4 Existing IT Landscape

- **Production tracking:** Google Sheets (stage-wise data capture)
- **WIP & Inventory:** Derived via manual consolidation
- **Existing ERP limitations include:**
  - No stage-wise WIP valuation
  - No production routing capability
  - No accurate inventory visibility or production planning output

## 4. Key Business Challenges

### 4.1 Inventory Management

- No real-time visibility of available stock
- Procurement not linked with:
  - Existing inventory
  - Production requirements
- High-value steel inventory risk due to lack of control

### 4.2 Work-in-Progress (WIP)

- Stage-wise WIP is critical for balance sheet accuracy
- Current system does not support:
  - Process-wise WIP tracking
  - Order-level WIP valuation

### 4.3 Production Planning & Scheduling

- No machine-wise production planning
- No visibility into:
  - Machine occupancy
  - Capacity utilization
- Unable to commit **realistic delivery dates** to customers

### 4.4 Procurement & Supplier Management

- No supplier intelligence such as:
  - Historical pricing
  - Lead-time performance
  - Vendor rating
- No automated comparison of **stock vs requirement**

### 4.5 Automation & Manpower Dependency

- Heavy reliance on manpower
- Need for:
  - OCR-based invoice scanning
  - Automated GST calculation
  - Reduced manual intervention (Target: **80% system-driven**)

## 5. Proposed Solution Overview (To-Be)

### 5.1 ERP Scope

Implementation of an integrated ERP solution covering:

- Sales
- Procurement

- Inventory
- Production
- WIP
- Dispatch & Logistics
- Accounting & GST

### **5.2 Production Management**

- Routing-based production orders
- Product-wise and order-wise process routing
- Stage-wise:
  - Quantity tracking
  - Quality checks
  - WIP valuation
- Forward-only material movement

### **5.3 Bill of Material (BOM) & MRP**

- BOM-driven material planning
- Automatic calculation of:
  - Required quantity
  - Available stock
  - Material shortfall
- Direct linkage with procurement processes

### **5.4 Procurement Management**

- RFQ and quotation comparison
- Supplier selection based on:
  - Past purchase rates
  - Lead time
  - Vendor performance
- AI-assisted supplier recommendations (phase-wise)

### **5.5 Inventory Control**

- Real-time inventory visibility
- Heat-wise / batch-wise tracking for steel
- Consumables inventory management

### **5.6 Production Planning & Delivery Commitment**

- Machine-wise production scheduling
- Capacity planning
- Delivery date calculation based on:
  - Machine availability
  - Material lead time
- Visibility to sales team for accurate customer commitment

### **5.7 OCR & Automation**

- OCR for supplier invoice scanning
- Automated GST calculation
- Manual validation during initial phase
- Advanced automation after data stabilization

## 6. Implementation Approach

### Phase 1

- Study existing Google Sheets and data flow
- Map one complete order lifecycle:
  - Procurement → Production → Dispatch
- Core ERP configuration
- Minimal customization

### Phase 2

- Advanced production planning and scheduling
- AI-based procurement intelligence
- OCR enhancement
- Dashboards and analytics

## 7. Assumptions & Dependencies

- Client will provide:
  - Production-related Google Sheets
  - One complete order data sample
- ERP configuration will be completed before customization
- Automation will be enhanced after achieving data consistency

## 8. Next Steps

1. Client to share production and inventory data
2. Shivit Technologies to:
  - Prepare ERP demo based on client data
3. Schedule next discussion for data walkthrough and system demo