

Introduction

Supplying a complete and well-organized consignment kit helps reduce receiving discrepancies, improves inventory accuracy, and allows your manufacturing partner to begin production as efficiently as possible.

This guide outlines commonly accepted industry best practices for preparing and shipping customer-supplied material to an Electronic Manufacturing Services (EMS) provider. While individual manufacturers may have additional requirements, following these recommendations will help create a smoother transition from your inventory to the production floor.

Before Preparing Your Shipment

Before gathering material, verify that:

- The Bill of Materials (BOM) accurately reflects the material being supplied.
- Quantities are sufficient to support the planned build, including any agreed setup quantities or attrition.
- Manufacturer part numbers and customer internal part numbers are current and consistent throughout the documentation and component labeling.
- Any approved alternate components are clearly identified and documented before shipment.

Resolving documentation questions before shipment helps avoid delays once material arrives.

Packaging Components

Whenever possible, retain components in their original manufacturer or authorized distributor packaging.

If components have been repackaged, ensure they remain adequately protected from:

- Electrostatic Discharge (ESD)
- Physical damage
- Moisture exposure (when applicable). Components with a Moisture Sensitivity Level (MSL) rating, such as MSL 3 or higher, should remain sealed until ready for use. If unsealed MSL-rated components are supplied, they may require baking in accordance with the manufacturer's recommendations before assembly. This may delay production and could result in additional processing costs.

As general best practices:

- Keep components on reels, tubes, or trays whenever applicable.
- Keep each part number in its own individually identified bag, reel, tube, tray, or other container.
- Secure partial reels to prevent component movement during shipment.
- Protect exposed carrier tape from damage.
- Package shipments to minimize movement and damage during transportation.

Labeling

Each component container should be clearly labeled.

Typical information includes:

- Customer Part Number (if applicable)
- Manufacturer Part Number
- Quantity Included
- Lot Number or Date Code (when applicable)
- Revision or Identification Information (when applicable)

Consistent labeling helps receiving personnel accurately identify material and reconcile it against the Bill of Materials.

Documentation

Include the documentation necessary for your manufacturing partner to verify the shipment.

This may include:

- Bill of Materials (BOM)
- Packing List
- Shipment Summary
- Identification of any approved alternates
- Notes regarding partial quantities or back-ordered items

Any deviations from the original BOM should be clearly communicated before or at the time of shipment.

Critical Components

Some components require additional attention because of their value, limited availability, long lead times, or project-specific importance.

If your shipment includes high-value, long lead-time, obsolete, or otherwise difficult-to-replace components, consider clearly identifying those items or notifying your manufacturing partner before shipment.

Examples may include:

- Sole-source components
- Obsolete components
- Long lead-time components
- High-value devices
- Customer-programmed or pre-programmed devices
- Engineering samples
- Components that would significantly impact the production schedule if damaged or lost

Early communication helps ensure appropriate handling, inventory awareness, and timely discussion should questions arise during receiving or production.

Shipping

Package material to minimize movement during transportation.

As general best practices:

- Separate fragile items from heavier components whenever appropriate.
- Protect moisture-sensitive devices in accordance with manufacturer recommendations.
- Use appropriate ESD protective packaging.
- Prevent reels, trays, tubes, and other component containers from shifting during shipment.
- For shipments to Accu-Sembly, please limit individual shipping cartons to 30 pounds or less to help reduce the risk of injury during manual handling. If a heavier carton cannot be reasonably avoided, please clearly mark it as "Heavy" and notify us before shipment.

Proper packaging helps preserve material condition from shipment through receiving.

Communication

If questions arise while preparing your consignment shipment, contact your manufacturing partner before shipping.

A brief discussion beforehand is often the quickest way to resolve documentation questions, packaging concerns, material substitutions, or shipment planning before they impact production schedules.

Many EMS providers also welcome a collaborative **Material Readiness Review** before the first shipment. Reviewing the consignment process together can help align expectations, improve material readiness, and reduce receiving discrepancies.

Final Checklist

Before shipping, verify that:

- ☐ BOM accurately reflects the supplied material.
 - ☐ Quantities have been verified.
 - ☐ Component labeling matches the documentation.
 - ☐ Approved alternates have been identified.
 - ☐ Critical or difficult-to-replace components have been identified.
 - ☐ ESD and moisture protection have been maintained.
 - ☐ Shipment documentation is complete.
 - ☐ Material has been packaged to prevent damage during transportation.
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Thank you for taking the time to prepare your consignment shipment. Following these industry best practices helps reduce receiving discrepancies, improves inventory accuracy, and supports a smooth transition into manufacturing.