



# Supplier Tooling Guidelines

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## **1.0 SUPPLIER TOOLING DEFINITION**

### **1.1 Glossary**

#### **SBT: Supplier Based Tooling**

Navistar Global Purchasing Organization, responsible for negotiation of SBT amount. Navistar is responsible for payment of Supplier Based Tooling cost.

#### **1.2 General Purpose**

This section of the Navistar SBT Guideline defines which items are classified by Navistar as tooling and which costs associated with tooling can be classed as SBT. Items and costs not mentioned in this document are not classed as SBT and will not be funded by a Navistar SBT payment.

Navistar will authorize payment, as SBT, the lower of the following amounts (excluding agreed cost increases due to design changes)

- a) The amount agreed with the supplier at Supplier Contract Timing.
- b) The actual cost incurred by the supplier for tooling.
- c) Mark-up on Supplier Tooling is not allowed

**Navistar does not allow any suppliers to make a profit on production tooling manufactured by a third party. Tooling is a pass through cost.**

#### **1.3 Navistar Tooling Items**

See Table 1. Only items listed in this table are classified as tooling by Navistar for purposes of SBT payment.

#### **1.4 Navistar SBT Costs**

See Table 2. Only cost items listed in this table can be reimbursed by Navistar through SBT payments.

#### **1.5 Investment Optimization:**

Navistar expects its suppliers to continuously strive to optimize the cost of specific tooling by actions such as:

- Setting cost reduction targets for SBT in line with those identified by SBT Tooling Managers.
- Technical specifications for the Tool limited precisely to what is necessary.
- Selection from competing toolmakers in the market, including LCC.
- Maximum use of standard components from competitive suppliers.
- Reconfiguration of existing facilities to accommodate new production.
- Design of new, more versatile facilities.

- Priority usage of flexible technology such as robotics, machining centers etc.
- Utilize flexible technology wherever it can be applied designing facilities in the form of: Industry standard or standardized machine + specific tools.

## 1.6 Exceptions

**1.6.1 Standard Parts Tooling** is not classified as SBT i.e. tooling for parts that are or will be sold to the aftermarket or customers other than Navistar.

**1.6.2 Prototype Tooling** is not classified as SBT i.e. tooling when not designed to satisfy mass production requirements.

**1.6.3 Duplicate Tooling** is not classified as SBT unless required to meet capacity requirements. Tooling capacity will be calculated on the basis of 5000 working hours per annum

**1.6.4 Tool Replacement/Refurbishment** is classified as SBT only if required as a result of production volume exceeding forecasted model life volume as defined in original RFQ or based on expected Industry Standard of Tooling life.

**1.6.5 Casting Dies Tool Replacement/Refurbishment** of aluminum casting dies is classified as SBT. The details concerning industry standard tooling life is referenced in **Article 5.4**.

## 1.7 Tooling Ownership

Navistar tooling items, including all tool design documentation and data, are 100% owned by Navistar; tool disposal must be carried out in accordance with the Navistar procedures.

## 1.8 Tooling Audit

Navistar reserves the right to audit cost of Supplier Based Tooling items at all levels of Suppliers for up to 2 years after purchase order date. Tooling Inventory is subject to audit at anytime with prior Supplier notice.

**Table 1: Navistar Tooling Items**

<b>Item</b>	<b>Qualification</b>
Dies – (Progressive, Transfer, Trim, Steel Rule, Restrike, Pierce, Form, Powdered Metal, Forging, Flange, Fine Blanking, Extrusion, Draw, Crimp, Camber, Blanking, Hemming, Roll Form.	Excluding transfer fingers
Fixtures – Assembly, Coating, Cooling, Drill, Leak Test, Machine, Paint, Plating, Shrink, Water Jet, Weld.	Only mechanical design, parts & assembly. Jig Posts must be fixed to the m/c base or frame via single detachable plate. Control equipment is excluded
Foundry Tools – Cope Drag, Core Box, Hunter Plate, Match Plate, Patterns, Trim Dies.	
Manual Checking Gauges	1 per shipping unit (max)
Injection Molds	
Gages – Final Assembly, Hand Held, In Process	
Die Cast – Permanent, Trim Die	
Bend Tooling – CNC Bender, Mandrels, Press Brake, Rod Bender, Tube Bender	
Paint Masks	
Racks – Paint, Plating	
Molds – Blow, Injection, Compression, Insert, Open, Rotational, RTM, Stack, Thermo Vac Form, Transfer, Trim Die, Foam.	
Patterns – Model, Pattern	

**Table 2: Navistar SBT Cost Items Considerations**

<b>Cost Item</b>	<b>Qualification</b>
Tool Design	Toolmaker costs only
Tool Materials	
Casting	Including Patterns/Models/Resins
Tool Components	Including Electrodes
Machining	Including NC data preparation
Tool Assembly	
Tool Try Out (no grain)	1 trial, Toolmaker costs only
Freight & Duty	1 time by land, from Toolmaker to Plant
Supplier Tool Tryout/Material	1 trial, Toolmaker costs only
Graining Costs	Including tool shipping
Graining Trial	1 trial
Programming	SBT Prior Approval

# **NAVISTAR TOOLING**

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**Navistar, Inc.**  
**Supplier Tooling Guidelines Overview**

The following document summarizes the Navistar Supplier Tooling Guidelines and Processes with respect to Supplier Based Tooling. From Navistar's perspective as the investing party, Suppliers will be expected to follow this Supplier Tooling Guideline as a direct result of accepting a Navistar Vendor Code and/or Purchase Order. It is the responsibility of all Tier 1 Suppliers to ensure that their sub-suppliers fully understand and comply with the applicable Tooling Guidelines.

If a Comprehensive Supply Agreement ("CSA") has been executed between Navistar and the Supplier, should there be any conflicting terms of the CSA, the CSA document will take precedence over the terms of Articles as stated within these Guidelines.

NAVISTAR has created the following document as a set of guidelines to inform Suppliers of the policies, objectives, purchasing procedures and specific requirements with respect to Supplier Based Tooling located at the facilities of the Tier I and that of Sub-Suppliers. All of these details contained within this document are set forth at the Navistar Tooling Managers Discretion.

## Article 1 Definitions

1.1 Within these Guidelines, the following terms have the following meanings:

“ATT”	Internal Navistar Document that is the Authorization to Tool;
“Affiliate”	An entity that: <ul style="list-style-type: none"> <li>(i) is controlled directly or indirectly by;</li> <li>(ii) controls directly or indirectly; or</li> <li>(iii) is under common control with Navistar or Supplier, as the case may be. “Control” for this purpose shall mean having a shared equity interest in the issued share capital of the other entity;</li> </ul>
“Background Patents”	<ul style="list-style-type: none"> <li>(i) any registered patent, registered utility model or registered design right acquired or owned prior to starting the Development Work; or</li> <li>(ii) Any application to register a patent, utility model or design right filed prior to starting the Development Work;</li> </ul>
“Buyer”	Navistar Supply Manager Purchasing Department Parts Buyer;
“CIF”	Has the meaning set out in <b>Article 6.5</b> ; “Customs/Insurance/Freight”;
“CSA”	<b>Comprehensive Supplier Agreement</b> , if any, entered into between Navistar and Supplier;
“Development Work”	All work necessary to develop the Parts so that the Parts meet all Specifications and are fit for their intended purpose. Development Work includes, without limitation, all initial technical discussions (for example, brainstorming sessions) between Supplier and Navistar, regardless of whether Navistar and Supplier have signed a definitive contract at the time of such discussions. Such discussions may include the exchange of Confidential Information, which shall be treated by the Parties in accordance with Navistar Confidentiality Agreements
“DTS”	<b>Direct Tooling Source</b> has the meaning set forth in <b>Article 7.1</b> ;
“DPTS”	<b>Direct Purchase Tooling Steel</b> has the meaning set forth in <b>Article 7.2</b> ;



“Guidelines”	Has the meaning set forth in <b>Article 2.3</b> ;
“Lien Release Document”	The document that sets aside any lien against tooling purchased by Navistar through a third party;
“LCC”	<b>Leading Competitive Country</b> has the meaning set forth in <b>Article 7.4</b> ;
“Navistar Drawing”	A drawing in any medium, including an electronic version in a CAD format, specification tender, standard or other technical document of similar nature made by or belonging to Navistar or any of its Affiliates;
“Navistar Property”	Has the meaning set out in <b>Article 4.0</b> ;
“OEE”	<b>Operational Equipment Efficiency</b> has the meaning set forth in <b>Article 6.8</b> ;
“Parties”	Supplier and Navistar;
"Parts"	All goods more particularly described in or by any Purchase Order, Acceptance Drawing or Request for Proposal, including production parts, trial parts, service parts, sample parts, accessories, raw materials, and Supplier Tooling together with any related services;
“PCBL”	<b>Product Change Background Letter</b> ; appears within document
Photographs of Tooling	Navistar tooling confirmation is achieved in some cases via electric validation. Therefore pictures are necessary to be submitted within the tooling invoice submission package;
“Piece Price”	The Cost of the Supplied Part (PP);
“Price”	The price of the Parts identified in the applicable Purchase Order; or Price of the Tooling;
“PSW”	Part Submission Warrant has its Navistar use set forth in <b>Article 9.8</b> ;
“Purchase Order”	Authorization for procurement of goods and services;
“RFQ”	Has the meaning set forth in <b>Article 6.1</b> ;

“SDM”	<b>Supplier Development Manager</b> has the meaning set forth in <b>Article 14.1</b> ;
“SOP”	Has the meaning set forth in <b>Article 3.3</b> ;
“Specification”	Any design (including engineering, quality, reliability & material standards), drawings in any medium (including electronic versions in a CAD format), data, descriptions, samples or other information relating to the Parts;
“STCBF”	<b>Supplier Tooling Cost Breakdown Form</b> has the meaning set forth in <b>Article 6.4</b> ;
“Subcontractors”	Third party Suppliers that Tier 1 Supplier delegates or subcontracts to manufacture Parts;
“Supplier Based Tooling”	Valid Tooling paid for by Navistar, and used by Supplier in manufacturing the Parts; <b>Article 12</b>
“Supplier Design”	A drawing in any medium, including an electronic version in a CAD format, created by Supplier based upon specification provided by Navistar or any of its Affiliates and design-released by Navistar or any of its Affiliates;
“Supplier Owned Tooling”	Has the meaning set out in <b>Article 13</b> ;
“STMR”	<b>Supplier Tooling Management Report</b> is a Tooling Status report issued by Navistar Tier 1 Suppliers on given intervals that captures the condition of the tooling assets (Tooling Life). It may include pictures and report on PM schedules and production counts.
“TAR”	<b>Tooling Acceptance Report</b> . Report issued by the Tier 1 supplier to Navistar that captures Navistar Asset location and specific tooling details and dimensions. It has its meaning set out in <b>Article 15.1</b>
“TIM”	<b>Tooling Inventory Master</b> – Standard Navistar (Excel) format for suppliers to use to capture a complete list of Supplier Based Tooling at a Supplier Location. <b>Article 15.2</b>
“TCM”	<b>Tooling Component Management</b> – A Navistar Tooling Strategy that allows for the direct purchase of tooling components from given tooling sources; has the meaning set out in <b>Article 7.3</b> ;

“Technical Information”	Has the meaning set out in <b>Article 3.2</b> ;
“Tier I”	Means the Supplier with a direct contractual relationship with Navistar;
“Tier II”	Means sub-suppliers to the initial Supplier;
“Tooling”	All tools, jigs, dies, gauges, fixtures, molds, patterns and other equipment used by Supplier in manufacturing the Parts;
Tooling Bailment Agreement	Essential Contractual agreement between Navistar and its Tier 1 Suppliers that governs the use of Navistar Supplier Based Tooling;
“Tooling Manager”	The person within the Global Procurement Department responsible for the Navistar Tooling Coordination and Purchasing duties;
“Tool Shop”	Manufacturer of Specific Tooling;
“TT”	Tooling Transparency – Document submitted by the supplier that captures details of Tooling Cost referenced with a Tool shop quotation;
“TLM”	Tooling Life Master – Supplier Document submitted to Navistar to proactively manage the to refurbishment timeline and project future requirements so as to avoid unnecessary costs. The specify form is found on the Navistar Supplier Webpage. <b>Article 5.2</b> ;

## Article 2 Supplier Requirements and Tooling Obligations

- 2.1 Supplier shall maintain the Tooling in good working condition so that the manufacture of the parts supplied is not interrupted.
- 2.2 Supplier shall properly house, care for, repair or, if necessary, replace all Supplier Based Tooling and shall bear the risk of loss or damage thereto (excluding normal wear). The Supplier Tooling is on loan by Navistar to Supplier.
- 2.3 Supplier agrees to be bound by the Supplier Tooling Guidelines (“Guidelines”) as provided to Supplier by Navistar. Such Guidelines may be revised, amended, or replaced from time to time by Navistar. Upon any such revision, amendment, or replacement, updates will be posted on the Navistar Supplier Portal within the “Supplier Tooling Tab”.
- 2.4 Supplier shall only use the Supplier Tooling for manufacturing the Parts for Navistar. Supplier shall, immediately upon Navistar’s request, release the Supplier Tooling to Navistar or its nominee in accordance with Navistar’s instructions. All Supplier Tooling shall be marked as the “Property of Navistar” by Supplier, shall not be commingled with the property of Supplier or any third person, and shall not be moved from Supplier’s premises (except for repair or modification) without Navistar’s prior written approval. Supplier shall not modify, lease, transfer or dispose of any Supplier Tooling unless Supplier obtains Navistar’s prior written consent.
- 2.5 Navistar and Supplier recognize that the Price quoted by Supplier for the Supplier Tooling may be an estimate. Navistar and Suppliers agree, however, that the estimated Price represents a maximum cost of the tools and that the firm Price shall be based on the actual cost to Supplier. At such time as firm pricing is established, Navistar will issue an amendment to the applicable Purchase Order to reflect current pricing. Supplier shall use best efforts to produce the Supplier Tooling at the lowest possible cost consistent with Navistar’s production part quality requirements. Navistar reserves the right to audit Supplier Tooling cost at the tooling or production location. Notwithstanding the above statements, any increase in the amount of any applicable Purchase Order may be accomplished only upon agreement of Navistar.
- 2.6 Navistar Supplier Tooling reserves the right to qualify all Supplier Tooling facilities that produce tools for Navistar. Navistar has the right to perform an on-site audit at any time. In the event Navistar disqualifies a tool shop, Navistar reserves the right to **(DTS)** direct the build of Navistar tools to any Navistar approved Tool Shop.

### **Article 3 Drawings and Engineering**

- 3.1 Supplier shall furnish Navistar with the Design Drawings. Navistar may copy, prepare derivative works and disclose the Design Drawings to any third party.
- 3.2 Supplier shall furnish Navistar with specifications, concept sheets, CAD data, information and other data Supplier acquires or develops in the course of Supplier's activities for Navistar as well as all other information and data that Navistar deems necessary to understand the Parts and their manufacture (collectively the "Technical Information"). As to any Technical Information that is Confidential Information, Navistar shall not copy and disclose such Technical Information to any third party without the prior consent of Supplier.
- 3.3 All Supplier Tooling Design is the property of Navistar. At any time Navistar requests tool design and layout information, Supplier will provide all requested documentation in a timely manner. At the start of production ("SOP") timing, all related digital files must be provided to the Supplier Tooling Manager by request. Navistar's Supplier Tooling department reserves the right to review the tool design before the tools are built. This review is not to approve the design, but to gather information about the Supplier Tooling process. At Supplier Tooling acceptance sign off, the Navistar Supplier Tooling Manager must be provided a CD with the tool design and/or strip layout on it. This is to aid in cost estimating of design changes. Cutter paths, etc. are not needed. Only a CAD drawing of the Supplier Tooling is required.

## Article 4 Navistar Property

- 4.1 All Navistar Drawings, Intellectual Property Rights owned by Navistar and Confidential Information supplied to Supplier by Navistar shall remain the property of Navistar, and Supplier shall use such property only for the purpose of fulfilling its obligations in supplying the Parts to Navistar.
- 4.2 All supplies, materials or other items paid for or reimbursed by Navistar to perform Supplier's obligations hereunder (collectively the "Navistar Property") shall remain the property of Navistar. Supplier shall use the Navistar Property only in connection with supplying the Parts to Navistar, and shall not use the Navistar Property in any manner whatsoever for the benefit of any other customer or third party without Navistar's prior written consent. Supplier shall, immediately upon Navistar's request, release the Navistar Property to Navistar or its nominee in accordance with Navistar's instructions. The Navistar Property shall be marked as the "Property of Navistar" by Supplier, shall not be commingled with the property of Supplier or any third person, and shall not be moved from Supplier's premises without Navistar's prior written approval.
- 4.3 Supplier shall indemnify Navistar against any claim adverse to Navistar's ownership of the Supplier Tooling, except as such claims may result from any acts or omissions of Navistar.
- 4.4 To the extent permitted by law, Supplier waives its right to object to the repossession of the Supplier Tooling by Navistar in the event Supplier initiates or is otherwise involved in bankruptcy proceedings.
- 4.5 Title to any modifications, changes or accessions to Supplier Tooling shall vest in Navistar regardless of whether Navistar has reimbursed Supplier for such modification, changes or accessions. Supplier shall keep such records in relation to the Supplier Tooling as Navistar may reasonably require. None of the Supplier Tooling shall be used in the production, manufacture or design of any goods or materials except to the order of Navistar. Supplier shall not sell or otherwise dispose of any product using Supplier Tooling to any party other than Navistar except where specifically authorized by Navistar in writing. Supplier's responsibility continues beyond the expiry date of the related parts Purchase Order.
- 4.6 If the Supplier Tooling is not utilized to produce any parts for Navistar for a period of two years, Supplier shall so notify Navistar Tooling Manager and request instructions as to the disposition of the Supplier Tooling. If Supplier subcontracts all or any portion of the manufacture of the Supplier Tooling, Supplier shall so notify Navistar in advance and obtain for all other documentation as Navistar may require from each such Subcontractor used by Supplier.

## Article 5 Tooling Refurbishment

- 5.1 It is expected that the Supplier will match tooling life to meet Navistar Program and service requirements. (Unless otherwise directed by Tooling Manager).
- 5.2 Ongoing Process for Identifying Refurbishment Requirements (TLM stands for Tooling Life Master which is a Navistar Form to report Tooling Life on a regular basis.)
- 5.3 Refurbishment Communication Requirement: The Supplier is responsible to proactively communicate the high potential failure of equipment or tooling based on the supplier's internal monitoring plan in a timely manner via written notification to the Navistar Tooling Manager. This must allow Navistar sufficient reaction time to secure funding and issue a Purchase Order in support of the tool repair timeline to maintain an uninterrupted supply of quality parts. At a minimum this needs to be 60 days prior to the required tooling kickoff timing. The Supplier's failure to do so will alleviate Navistar's financial responsibility including but not limited to associated bank runs, expediting costs, warranty claims and production delays.

If Navistar requires the Supplier to continue to produce products under the Supply Agreement beyond the expected useful life of any piece of Equipment or Tooling (including without limitation to providing post-production service parts), Navistar shall replace such Equipment at its expense and within a time frame that does not cause disruption to the Supplier's production under the Supply Agreement. The parties shall cooperate in determining when any piece(s) of Equipment or Tooling will exceed their expected useful life (per industry standards) and the expected production of products under the Supply Agreement so as to ensure a timely replacement of Equipment and Tooling that will exceed its expected useful life. Supplier shall not be responsible or liable for quality problems or production delays caused by Supplier's failure to timely replace Equipment or Tooling that has exceeded its expected useful life when advanced notice to Navistar has been confirmed.

- 5.4 Forging and Casting Tool Replacement/Refurbishment  
Navistar will purchase the first set of forging or casting tools. The cost for refurbishments and/or replacement of all forging and casting tools will be capital expenditures. The Tier I Supplier will be responsible for the communication of all forging and casting tools and all maintenance requirements through the program life. All Tooling will be produced to normal industry standards set by the Forging Industry Association (FIA) and the North American Die Casting Association (NADCA).

The following is a guideline for typical replacement tooling life based on Industry Standard:

High Pressure Die Cast: 100,000 per cavity (Aluminum and Magnesium)

Low Pressure Die Cast: 40,000 per cavity (Aluminum only)

Sand Cast: 20,000 per cavity (All Metals)

Permanent Mold: 60,000 per cavity (Aluminum)

Core boxes: 250,000 per cavity (All Metals)

This guideline applies a complexity factor of (+/- 15% range) which is typically used. These values are confirmed by Tooling Manager's & Engineering discretion.

## Article 6 RFQ Process and Validation Requirements

- 6.1 When Navistar sends a request for quote (“RFQ”), it is required that Suppliers will process the request and respond within the prescribed timing. Tooling Quotes are to be sent directly to:
- (1) Supplier Tooling Manager;
  - (2) Purchasing (Supply Manager, Program Manager, Commodity Manager)
  - (3) All Tooling must use the latest version of the Tooling Transparency that resides on the Supplier Website.
- 6.2 Navistar requires Supplier to provide at sourcing timing three (3) competitive tooling quotations. Upon request one quote may be from an LCC country.
- 6.3 Supplier may be required to submit competitive pricing on all Supplier Tooling. Navistar reserves the right to request and audit tool shop quotes to validate supplier compliance.
- 6.4 Supplier may be required to submit a complete detailed tooling cost breakdown using the Navistar form “STCBF” or its own format. This document must capture all build hours associated with each operation within the tool build for validation purposes. Also this document must specify the Steel Grade & Steel Block Sizes of the Core and Cavity steel in “L x W x H Format. Additionally, the Manifold Configuration, details and number of drops. For Dies the dimensions & grades of all die detail steels & die shoe material may be requested. Navistar reserves the right to accept or decline certain costs based on this analysis.
- 6.5 Customs/Insurance/Freight (“CIF”) costs are to be itemized on the (TT) Tooling Transparency form tool by tool. Evidence of these costs will be required at the time of the Supplier Tooling audit.
- 6.6 Navistar expects tooling to be built to provide production and service parts appropriate for the volume and life of the program.
- 6.7 Navistar will reimburse Supplier’s cost for the first set of production Supplier Tooling only. The refurbishment or replacement costs of all tooling will be evaluated individually on "as needed basis".
- 6.8 In the event a model’s volume requirement exceeds the original plan, it is Navistar’s expectation that Supplier will submit the request for additional Supplier Tooling to both the Supplier Tooling Manager and the Supply Manager. The request must include a capacity study, the Overall Equipment Effectiveness (“OEE”), i.e. the standard calculation for the OEE.
- 6.9 Preventative maintenance will be at Supplier’s expense. Supplier must have all preventative maintenance records associated with all Supplier Tooling for Navistar’s Supplier Tooling Manager review. Supplier will be required to keep the Supplier Tooling in “good working condition” to be able to produce parts that meet Navistar production and quality requirements. All records will be made available for review.
- 6.9.1 All tooling quotes to Navistar will be accepted in USD currency or in the currency as specified by Navistar Production Purchasing.



## Article 7 Tooling Cost Reductions Processes

Navistar reserves the right to conduct the following activities for the RFQ and sourcing process, and Suppliers are expected to fully participate. Navistar Supplier Tooling engineering will provide the requirements, training, etc. to support the following:

- 7.1 (DTS) - Direct Tool Sourcing - Strategy where at Navistar OME level we elect to purchase tooling “directly” from our own approved tooling sources within the Navistar “Preferred Tooling Panel”. Separate Supplier Contracts and RASIC Responsibility Matrix apply to this type of tooling arrangement.
- 7.2 (DPTS) - Direct Purchase Tooling Steel - Strategy where at the Navistar OME level we elect to purchase “directly” the tooling steel required for a Navistar Tooling Project from the forge at the size and specification supplied by the Tier 1 Supplier.
- 7.3 (TCM) - Tooling Component Management - Strategy where at the Navistar OME level elects to directly purchase the tooling components required for a Navistar Tooling Project from the Component Supplier at the specification supplied by the Tier 1 Supplier.
- 7.4 (LCC) – Leading Competitive Country - Strategy to establish the “Best in World” costing for Navistar Supplier Based Tooling commodities that use tooling comparison evaluations. This option draws on the world’s cost baseline to provide tooling quote analysis and sourcing. It is Navistar’s intent is to request LCC quotes with new tooling opportunities knowing that “Best in World” costing may be local

## Article 8 Identification

- 8.1 In the event that Navistar issues a Tooling Purchase Order, all right, title, and interest in and to any part of the Tooling, including any and all designs, drawings, specifications, spare parts, trial parts and ancillary products, shall pass to Navistar as soon as it is acquired or fabricated in accordance with a Tooling Purchase Order or other written documentation issued by Navistar. During the term of a Purchase Order, all such Supplier Tooling in the possession of Supplier shall be deemed to be bailed property and shall not be deemed to be a fixture or a part of Supplier's real property.
- 8.2 Supplier expressly waives and releases any and all statutory, equitable or other liens, including but not limited to any molder liens, special tool liens, builder liens and the like, that Supplier has or might have on or in connection with the Supplier Tooling for any and all work, including but not limited to, designing, manufacturing, improving, maintaining, servicing, using, assembling, fabricating or developing the Supplier Tooling. Supplier hereby agrees to indemnify, defend and hold Navistar harmless from and against any loss, liabilities, costs, expenses, suits, actions, claims and all other obligations and proceedings, including without limitation all attorney's fees and any other cost of litigation that are in any way related to releasing, terminating or otherwise removing any such liens placed on the Supplier Tooling, including any such liens filed by a third party.

Note: Lien Release form Located within in the NAVISTAR Supplier Website

- 8.3 Supplier Identification Instruction
  - (1) Properly house and maintain such property on Supplier's premises;

- (2) Suppliers will identify Navistar assets listed within the Navistar Purchase Order. Tools must be stamped, etched or tagged with Navistar supplied tag or include the following information on the operator side of the tool:
- a. Prominently mark it "Property of Navistar";
  - b. Refrain from commingling it with the property of Supplier or with that of a third party;
  - c. Adequately insure it against loss or damage; and
  - d. Legible tooling identification must be maintained at all times
  - e. CAT, NC2 and Ford require their own individual tooling Identification

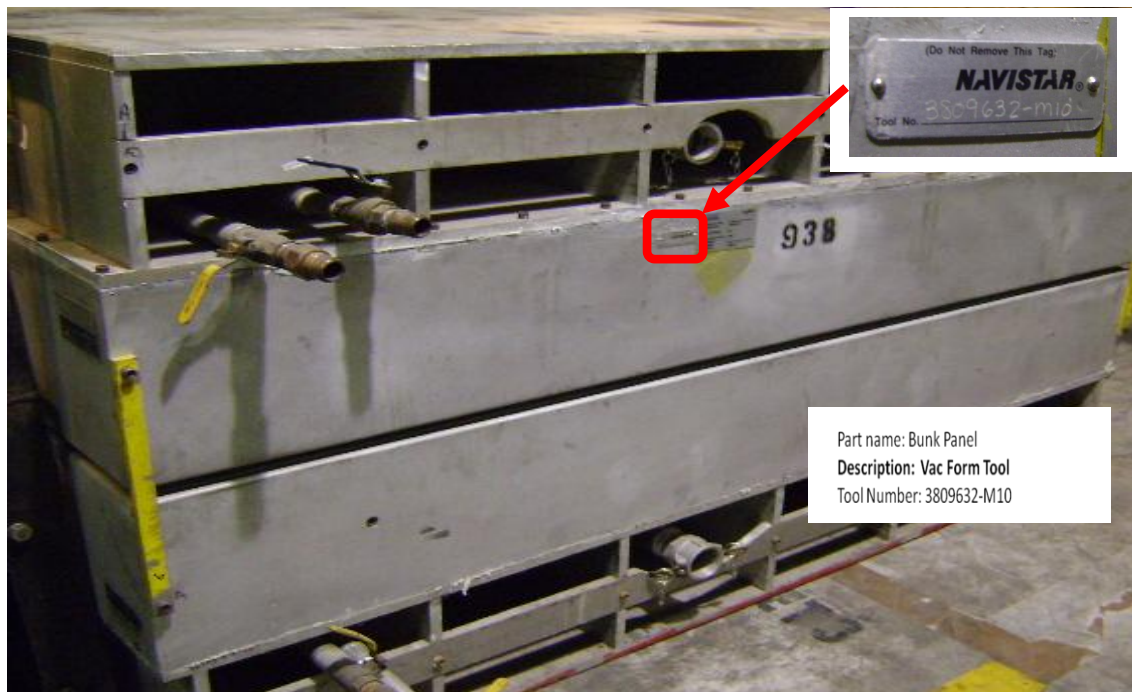
## Article 9 Submission of Tooling Pictures

- 9.1 The number of pictures that can be sent in one email to [SBTAPSCAN@Navistar.com](mailto:SBTAPSCAN@Navistar.com) is limited by the size of the incoming email to Navistar is 5MB. We recommend no more than 30 pictures of 100KB in one e-mail. Remember to resize your pictures so that they do not exceed the 100KB file size per picture.
- 9.2 If a tool photograph was initially submitted under the supplier code & supplier location for "Supplier/Location A", and the tool subsequently is moved to "Supplier/Location B" (due to resourcing action, distressed supplier, etc.), a new photograph does not have to be submitted, unless there is a Navistar-Funded Tool Order involved in the move. Notify Navistar via the TAR Document as per the tooling relocation practice within the tooling guidelines for tooling move. The tooling tag will not have to change.
- 9.3 Please submit the pictures as part of the invoice package to the following email:  
[SBTAPSCAN@Navistar.com](mailto:SBTAPSCAN@Navistar.com)
- 9.4 Photograph File Compression - To make pictures meet the 100KB file size limit. This is readily achieved by using the Microsoft "send to > mail recipient" function (right mouse click over the picture files) from any folder, including local hard drive or shared drive, using Microsoft Windows Explorer (Accessories or right mouse click over "Start" > explore). Similar functionality is available on Apple systems.
- 9.5 Photograph Naming; Navistar designates a unique (TL) Tooling Number for each Supplier Tool. The expectation is that the TL number should be used for the photograph file name is as follows: TL0001234 in the case of multiple pictures for same tool TL0001234\_1, 2, 3
- A. CAT uses the same process for tagging numbers however; the asset numbers are assigned directly from CAT.
- 9.6 Ensure that the picture is focused, includes clear view of the Navistar Property Tag, is well lit and shows the entire tool and identifies the location of the tag. While it might not be necessary to point out the tag in all cases, a pointer might be necessary in some cases to capture the tooling number.

- 9.7 Ensure that the picture is in focus, includes the entire tooling tag, is well lit and legibly shows all the markings on the tag or Tool marking. Please see an example below.



The Supplier can submit one composite picture that shows the actual tag (close up) with another image that shows that the tag has been affixed to the tool. See Below:



- 9.8 All payments are made after invoice approval. Invoice must be billed in the currency and dollars as identified on the Purchase Order. A copy of the TAR, PSW, or Interim PSW, Purchase Order, Tooling Pictures and Standard Lien Release Form (if requested) accompany all invoice(s).
- 9.9 All documentation must be completed by the Supplier and signed off by the Supplier Tooling Manager as a complete Supplier Tooling Invoice Package prior to any release of final payment.
- 9.9.1 Navistar's payment obligation shall be no more than the specified maximum and "not to exceed" number, if; (i) Supplier's actual costs for purchased materials and services (including purchased Tooling and portions thereof); and (ii) Supplier's actual cost for direct labor and overhead. Supplier shall establish a reasonable accounting system that enables ready identification of Supplier's cost. Navistar may audit Supplier's records, at any time prior to two (2) years after SOP date, to verify Navistar's payment obligation to Supplier.
- 9.9.2 Please refer to the appendix for invoice instructions and examples Page 44

## Article 10 Part Design Change Process

The supplier will receive a RFQ package that may require both a completed Tooling Transparency and an additional Supplier Tooling Cost Break Down Form ("STCBF"). This process is at the Tooling Managers Discretion. The supplier will complete the STCBF and send a copy back to the Supplier Tooling Manager. Note: Design Releases do not authorize Suppliers to start, build or contract tools.

## Article 11 Tooling Cost and Audit Guidelines

- 11.1 If there are questions about individual tool eligibility, the Navistar Supplier Tooling Manager should be contacted for an evaluation. Any exceptions to these Cost Guidelines must be approved at the appropriate Navistar level.
- 11.2 Navistar shall reimburse Supplier the lesser of: (i) the amount specified in this contract; or (ii) Seller's actual costs for purchased materials and services (including purchased tooling or portions thereof), plus Supplier's actual direct costs for labor and overhead typically associated with tool construction. Navistar or its agents shall have the right to audit and examine all books, records, invoices, payments, bank records, supplier quotes, original Tool Shop invoices, facilities, work, material, inventories and other items relating to any claim of Supplier for Tooling.
- 11.3 Navistar's obligation is to reimburse the approved tooling costs incurred up to the amount authorized by the Tooling Purchase Order. Navistar will not allow for reimbursement to suppliers for tooling costs in excess of the amount authorized, or for Tooling that is not specified (and authorized) by the Tooling Purchase Order. If the actual cost incurred is less than the Tooling Purchase Order amount, the supplier is expected to notify the Tooling Manager so that the Tooling Purchase Order can be adjusted to actual cost(s).
- 11.4 The Tier I/Tier II Suppliers are responsible for monitoring the content and costs of all subcontracted Tooling such as outsourced components, to ensure that they have met the entire Supplier Tooling Guideline Requirements.
- 11.5 Tooling Record Retention - Navistar will hold the Tier one responsible for maintaining all tooling documentation to validate the tooling cost. The tier one will be responsible for all cost incurred by any of its sub-suppliers and the validation of those costs. The tier one will be required to provide the following and maintain the history for a minimum of 2 years from SOP date.
- a. Navistar Tooling Purchase Order
  - b. Tier one or Tier one supplier(s) purchase order issued to the tool shop
  - c. Original Invoice and tooling quotes
  - d. All (CIF) transportation fees associated with Navistar Supplier Tooling
  - e. All applicable engineering design of tooling and part upon request
  - f. All time sheets, time cards or time records associated Navistar Tooling
  - g. Cancelled checks and/or bank statements as proof of payment
- 11.6 The Tier I/Tier II Supplier is required to maintain an accounting system, with generally accepted accounting practices, and must show a separate accumulation documenting expenditures for all Supplier Tooling. The supplier's accounting system must ensure that all eligible costs are documented adequately and include the following:

- 1.) Tooling for Service Parts. Navistar Purchasing maintains a system for proper control and disposal of Supplier Tooling. In order to minimize Navistar's costs and to ensure continuous availability of parts to our customers, Service Parts Purchasing activities must be consulted before scrapping or reworking production tooling to a new design level.
- 2.) Cost evaluation. The Tier I, Tier II or Tool Shop are subject to providing the STCBF, Cost Transparency form, tooling description, strip layout, process layout any other information requested from the Supplier Tooling Manager. All information will be submitted within a timely manner. Suppliers will be required to submit all Tooling Transparencies for design changes within a forty-eight (48) hour period from receipt of RFQ or as otherwise agreed to by the Supplier Tooling Manager.
- 3.) Navistar Tooling Audits. All Tooling Purchase Orders are subject to audit. In the event Navistar audits the supplier's Tooling cost, it will be necessary to provide the following supporting documents: (three valid tooling quotes (including all LCC), purchase orders to supplier, invoices, proof of payment and any other supporting documentation requested by the Navistar Supplier Tooling department. This documentation will be required to verify the actual and reasonable costs associated with the Tooling Purchase Order(s) and amendments selected for audit.
- 4.) Supplier Billings. The Supplier's invoice for tooling costs incurred should reflect the Tooling Purchase Order amount, or the actual costs incurred, whichever is less. At no time should the Supplier's invoice exceeds the amount of the Tooling Purchase Order.
- 5.) Subcontracted Work. Subcontracted work to tooling sub-suppliers must be supported by a Tooling Purchase Order, invoice, and proof of payment (including a waiver of claim or the Navistar standard lien release from the sub-supplier). If Tooling is obtained through or by a Supplier-owned subsidiary or Affiliate, those costs will be regarded as "in-house" costs and subject to verification.
- 6.) Labor Rates and Hours. The Tier I, Tier II Suppliers or Tool Shop will be held responsible for completing the Navistar STCBF upon request of the Tooling Manager for all Tools, Assembly Fixtures & Gages (located in Tier 1 and its suppliers). The labor rate quoted on the STCBF shall include all overhead costs associated with the design and manufacture of tools, shall be included in the STCBF. The labor rate and hours will be reviewed by the Navistar Supplier Tooling Manager for reasonableness before the issuance of the Tooling Purchase Order.
- 7.) Tool Sampling Material. Material requisitions that indicate quantities used and unit cost by Tooling Purchase Order must be itemized. Material costs should be reduced for any such costs recovered from tooling authorized for disposal or for material used for prototype parts (that were purchased under a separate Tooling Purchase Order). Material will be reimbursed normally at actual costs based on invoices. Material certification will be maintained within Supplier's records.
- 8.) Kirksite Material – Special consideration will be given to tooling constructed from Kirksite Zinc Derivatives and the cost of this material may or may not be included in the total cost of the tooling. The reuse of the material will be negotiated on a separate basis per Purchase Order.
- 9.) Supplier Audit Responsibility – Supplier must have the following available at the time of the Navistar Tooling Audit:
  - (1) Navistar Purchase Order (issued to the Supplier)
  - (2) Completed (TAR) Tooling Acceptance Report (completed by Supplier)

- (3) Quotes from Tool Shops
- (4) Supplier's Tool Shop Purchase Orders
- (5) Tool Shop invoices for every Navistar asset billed to Navistar
- (6) Tooling Inventory Master (TIM) Navistar standard excel file format for capturing the listing of the entire tooling inventory for given Supplier Location
- (7) Purchase Order asset identification (containing Navistar Tooling Tag ID Numbers) properly installed on Supplier Tooling
- (8) Supplier is required to submit a new quote that captures any adjustments to original Purchase Order to Navistar based upon audit results within two (2) weeks after audit completion.
- (9) Navistar reserves the right to debit the Supplier upon completion the Tooling audit for all items that are not classified as Supplier Tooling according to these Supplemental Guidelines and at the Tooling Managers Discretion. All costs to Navistar that Supplier cannot validate will be debited the full or unsupported amount of the listed item.
- (10) Navistar shall have the right to inspect Supplier's facilities and operations at any time during supplier's business hours and upon reasonable notice for purposes of verifying Supplier's compliance with its obligations in supplying the Parts, including those relating to Supplier's manufacturing process and quality assurance systems.

## **Article 12 Reimbursable Supplier Based Tooling**

12.1 Navistar will purchase the following as reimbursable Supplier Tooling:

- (1) Dies – Various\*
- (2) Molds – Various\*
- (3) Jigs/Fixtures/In-Process Gages (At the Discretion of Tooling Manager)\*
- (4) Final check gauges (if required by Navistar) \*\*

\*Refer to the List of Reimbursable Tooling Table beginning on page 30 of this document.

\*\*The Supplier Tooling Manager must approve the purchase of the final check gauges.

12.2 Funding for prototype special tooling that is not intended for use to produce Production Parts will be provided and invoiced through a separate (Prototype Purchasing Department). Production Supplier Tooling that is considered pull-ahead or used for prototype, which will later be used to produce production parts, will be treated as normal Supplier Tooling and will be funded through a normal Supplier Tooling Purchase Order.

12.3 The following items cannot be included in Reimbursable Supplier Tooling costs.

- (1) Set-up costs such as wiring equipment, making pits, overhead steel, etc. Generic and perishable tooling is not reimbursable by Navistar, and is the responsibility of the Supplier. (i.e., fasteners, cutters, drill, etc.).
- (2) Software and Programming required for the direct production of Navistar Parts is not considered Supplier Based Tooling and is not reimbursable under these guidelines.
- (3) Tools that are expendable or that have possible application for after-market products will not be considered as Supplier Tooling. Examples of the after-market commodities are Tires, Audio Equipment and Shocks
- (4) Overhead, profit, markup, interest or commissions from Suppliers, when the tool originates at a third party is not considered to be Reimbursable Supplier Tooling.
- (5) The Cost of General Maintenance and Spare Parts
- (6) Tooling costs for part identification, packaging labels and fasteners.
- (7) Supplier employee travel expenses, layouts, sampling costs (PPAP, tooling/process run-offs), general staff resources, etc.
- (8) All cost associated with procurement, follow up, etc. are considered to be part of the Tier I/Tier II Supplier's overhead costs.
- (9) Supplier equipment, new or used, dedicated or non-dedicated, including but not limited to the following: forging presses, stamping presses, weld presses, presses (any variation of or similar), CNC machines, computer and CAD stations, automated transfer systems, robots, lab equipment, indexing equipment/machines, tool room equipment, handling equipment, layout equipment, and CMM equipment are not considered Supplier Tooling.

**Article 13 Provisions Applicable to Supplier OWNED Tooling**

If the Part "responsible" Supplier has been notified that any specific/unique tooling essential to the production of the Part detailed in any current or pending Purchase Order or sourcing documentation is to be funded by the Supplier ("Supplier-Based Tooling"), the following provisions shall apply:

- (1) The Supplier at its own expense will properly maintain and support the Supplier-Owned Tooling.
- (2) In consideration of Navistar's Purchase Order for Parts to be produced from the Supplier-Owned Tooling, the Supplier grants Navistar an exclusive, irreversible option to purchase Supplier-owned Tooling by paying the lesser of the outstanding un-recovered capitalization or the fair market value at the time Navistar exercises the option. Navistar may exercise this option at any time and in the event of termination or expiration of the Purchase Order, and upon such exercised by Navistar, The Supplier will cooperate with Navistar's removal of the property from The Supplier's premises. If The Supplier finances any portion of the Supplier-owned Tooling, the Supplier will obtain for Navistar the rights granted in this subsection.



## Article 14 Tooling Transfer Process and Responsibility

- 14.1 Prior to any Supplier Tooling relocation, including internal and external tooling moves (To a New Location within Supplier A) and (Supplier A to Supplier B) the Supplier must notify and gain agreement from all of the following Navistar individuals or departments unless otherwise directed by Navistar:
- a. Tooling Manager
  - b. Supply Manager
  - c. Supplier Development Manager (SDM)
  - d. Upon agreement of any Supplier Tooling move a new Tooling Acceptance Report (TAR) must be created and submitted to the Supplier Tooling Manager (at the time of the tool move or relocation).
- 14.2 The Supplier is not to move tooling to another location whether owned by Supplier or a Third party, without the prior written consent of Navistar, except in the case of an emergency, where notification is still required with in twenty-four (24) hours of the tooling movement.
- 14.3 At the time of a tooling move a complete tooling inventory is required to be submitted to the tooling manager by the Tier1 supplier and its sub-suppliers on the standard Tooling Inventory Master (TIM) Format.
- 14.4 At the time of a tooling movement, it may be necessary for a supplier to provide a Lien Release for all Navistar Tooling in conjunction with the final payment.

## Article 15 TAR -Tooling Acceptance Report, TIM - Tooling Inventory Master

- 15.1 TAR – Tooling Acceptance Report – This is the key inventory record document for all Navistar Tooling Validation completed by our suppliers and submitted via the invoice package as it applies to each purchase order. This form is a binding document signed by both the Navistar Tooling Manager and Supplier representative to confirm its accuracy.
- a. Suppliers are to prepare the TAR document to capture actual tooling information including exact physical location and specific tooling details/dimensions.
  - b. The TAR document must be prepared in full supporting each Navistar Purchase order and is a final invoice requirement for payment.
  - c. The TAR (Tool Acceptance Report) document should show in detail all tools, fixtures, or assemblies as listed on purchase order.
  - d. The TAR form has complete “hover over” specific help instructions to aid in its completion embedded in the document's format.
- 15.2 TIM – Tooling Inventory Master - This is the Master List of all the Navistar Supplier Based Tooling for a given supplier location using the standard Navistar Excel Format. This is a standard template across all Navistar suppliers to manage the tooling inventory.
- a. The TIM, File will include all the tooling that the tier 1 supplier is responsible for at all of their sub suppliers' locations.
  - b. Each supplier will have a number related to its address listed on the header of the master list. The individual tool line item will indicate that production tool location
  - c. Most of the required information comes directly from the TAR form (where cells are matched to provide for the ease of use) to cut and paste information from the individual TAR records into the Tooling Master File.
  - d. The supplier will then populate other required information when the tool is complete, during the final payment stage.
  - e. This document should be kept up to date and available upon Navistar request.

# Navistar Reimbursable Tooling Schedule

## Section 1 – General Costs

Reimbursable? (Y/N)      Ownership (N = Navistar    S = Supplier)

	<b>Item Description</b>	<b>Reimbursable (Y/N)</b>	<b>Ownership (N or S)</b>	<b>Cost Liability/Reasons</b>
1	Interest carrying cost	N	S	
2	Launch Costs	N	S	
3	Installation Costs, Set Up Costs, and Adaptation, (i.e. fitting production tooling to manufacturing equipment) Cost of Tooling	N	S	
4	Consultation Fee	N	S	
5	Management/Project Fees	N	S	
6	Tooling Development Costs	N	S	
7	Test Cost & Test Equipment/Durability Fixtures	N	S	
8	Tooling Insurance	N	S	
9	Tooling Handling Cost	N	S	
10	SG&A Cost	N	S	
	Painting/Coating Racks	Y	N	Unique to Navistar Part
11	Off-loading Costs	N	S	
12	Compression Costs	N	S	Incremental premium direct labor charges are acceptable only when it is necessary to improve tool timing. These changes must be approved by the buyer and identified separately as a line entry on the Tooling Contract. Fully loaded labor rates will not be acceptable for premium charges.
13	Tooling Changes	N	N	Dies, Gages, Machining Tools, Welding and Assembly Fixtures. Only when caused by Navistar authorized engineering change (reference Special Tooling Guidelines and Definitions). If Navistar initiates the change...

## Section 2 – Engineering

Reimbursable? (Y/N)      Ownership (N = Navistar   S = Supplier)

ITEM DESCRIPTION	REIMBURSABLE	OWNERSHIP	COST LIABILITY/REASONS
1    Operating Systems	N	S	Capital Equipment
2    Design Software	N	S	Capital Equipment
3    Part or Component Design	Y	N	Piece Price/NRE
4    Dies, Molds, Patterns, Etc...	Y	N	Supplier Based Tooling
5    Computer Programs	N	S	Capital Equipment
6    Computer Equipment	N	S	Hardware/Software
7    Component Drawings, Tooling Drawings, & Design Concepts	Y	N	Design, Part, Prototype
8    Capital Equipment Marking Requests	N	S	Capital Equipment
9    Process Documentation	N	S	Piece Price
10   Programming Fees	N	S	CNC/Routing Programming
11   Assembly Process Design	N	S	Design, Part, Prototype

## Section 3 – Miscellaneous Capital Equipment

Reimbursable? (Y/N)      Ownership (N = Navistar   S = Supplier)

ITEM DESCRIPTION	REIMBURSABLE	OWNERSHIP	COST LIABILITY/REASONS	
1	Supplies to the Cell / Workstation	N	S	Capital Transferable
2	Transformers	N	S	Capital Transferable
3	Installation / Commissioning	N	S	Capital Transferable
4	Extractor System	N	S	Capital Transferable
5	Cell / Workstation power supply	N	S	Capital Transferable
6	Furniture in Cell / Workstation	N	S	Capital Transferable
7	Benches	N	S	Capital Transferable
8	Seats	N	S	Capital Transferable
9	Stands	N	S	Capital Transferable
10	Machine Guarding	N	S	Supplier Responsibility
11	Safety Fence	N	S	Supplier Responsibility
12	Light Beams	N	S	Capital Transferable
13	Multiple Tooling	N	S	Only when a capacity study is submitted by the supplier and approved in advance by the tool analyst/supplier development activity.
14	Balconies	N	S	Control Panels, Railings, Stairways, Surge Tanks and Overhead Lifts.
16	Computer Equipment (hardware / software)	N	S	Capital Transferable
17	Control Devices	N	S	That regulates machine functions, line functions, and/or automated handling mechanism functions.
18	Embossing Rolls	N	S	Supplier Responsibility
19	General Special Purpose Automation Equipment	N	S	If the special purpose equipment is an intricate part of the tooling process

20	Load and Unload Fixtures, Transfer Fixtures, or Turnover Fixtures	N	S	Supplier Responsibility
21	Microprocessors	N	S	Integrated circuits, chips, modules, etc.
22	Microprocessor Controls	N	S	Commercially available, programmable devices (e.g. PLC's weld controllers, etc.)
23	Microprocessor (Costs related to production of)	N	S	Capital
24	Computer Equipment	N	S	Capital
25	Printer	N	S	Capital
26	Recording Devices (Audio and/or Video)	N	S	Capital
27	Vision and Laser Equipment	N	S	Capital
29	Safety Related Equipment	N	S	e.g. Shielding, Fencing, Guards
30	Temporary Tooling	N	S	Prototype or Supplier
31	Test Equipment ( for "Test Fixtures" refer to "Gages" Section)	N	S	If specified by engineering or for a final gage.
32	Computer Test Equipment	N	S	Capital Equipment
33	Environmental Chambers	N	S	Capital Equipment
37	Tooling Aids	N	N	Die Model Only
38	Vision System	N	S	Capital Equipment
39	Bender Tube and Rod	N	N	Part Touching Component Only... Unique
40	Cut off Tools	N	S	Capital Equipment
41	Heat Staking (nests)	N	N	(Nests Only)
42	Vibration Welding (nests)	N	N	(Nests Only)
43	Sonic Welding (nests)	N	N	(Nests Only)

44	Work in Process Containers	N	S	Capital Equipment
45	Simulation	N	S	Capital Equipment
46	Integration	N	S	Capital Equipment
47	Dunnage or Packaging	N	S	Piece Price
48	Leak Testers	N	S	Frames, electronics, lighting, safety equipment, pneumatic/hydraulic equipment, casters, table lifts, etc. NAVISTAR will only reimburse cost for nests or part of holding fixtures.

## Section 4 – Molds and Patterns

Reimbursable? (Y/N)      Ownership (N = Navistar   S = Supplier)

ITEM DESCRIPTION		REIMBURSABLE	OWNERSHIP	COST LIABILITY/REASONS
1	Designs Directly Related to Molds and Patterns	Y	N	Tooling
2	Development Plasters	Y	N	Tooling
3	Kellering and Spotting Plasters	Y	N	Tooling
4	Molds	Y	N	For Rubber, Plastics, Foam, Nonferrous and Ferrous Metals
5	Water Jet Nests	Y	N	Tooling
6	Patterns	Y	N	Castings / Vac Forms
7	Foam	Y	N	Models, Patterns, ILD, Blocks, Templates
8	Gas Counter Pressure / Vacuum Systems	N	S	Intellimold, Etc.
9	Water Manifolds	N	S	Supplier
10	Quick Change Mold Plates	N	S	Supplier
11	Quick Change Connectors	N	S	Supplier
12	Cavitations beyond minimum required for production volumes	N	S	Supplier
13	Hot Runner Controllers /Manifold Controllers and Connectors	N	S	Capital Equipment
14	Pneumatic/Hydraulic Controllers and Connectors	N	S	Capital Equipment
15	Robots/Pickers	N	S	Capital Equipment
16	End of Arm Tooling	N	S	Supplier – Part Dependent
17	Insert Holder Blocks	N	S	For MUD Inserts
18	Eye Bolts (Standard or Swivel)	N	S	Capital Equipment
19	Gas Assist Controllers and Connectors (Gain, Epcon, etc. Through nozzle or pin)	N	S	Capital Equipment
20	De-Gating Fixtures	N	S	Capital Equipment
21	Routing Fixtures	Y	N	Nests Only
22	Clip and Fastener Fixtures	Y	N	Nests Only
23	Cooling Racks	Y	N	Unique Part Requirements
24	Spare Parts	N	S	The Supplier is responsible for Maintenance/ Replacement.
25	Tryouts – Design Change	Y	S	Required Navistar Change
26	Tryouts – Initial Tool Validation	N	S	
27	Tryout Material – initial tool Validation	N	S	
28	Part Layout / Dimension studies	N	S	These are PPAP costs; therefore Navistar will not reimburse these expenses.
28	RJG – Cavity Pressure Sensors	N	S	Supplier – Part Dependent



## Section 5 – Dies

Reimbursable? (Y/N)      Ownership (N = Navistar   S = Supplier)

ITEM DESCRIPTION		REIMBURSABLE	OWNERSHIP	COST LIABILITY/REASONS
1	Air Cylinders, Springs, Gas & Nitrogen Pads	N	S	Supplier Capital Equipment
3	Automation (Transfer Fingers)	N	S	Supplier Capital Equipment
4	Bolster Plates	N	S	Supplier Capital Equipment
5	Design directly related to Dies and Details	Y	N	Tooling Cost Section within Tooling Guideline Applies
6	Die Maintenance	N	S	All Maintenance required to achieve part quality is Supplier Responsibility
7	Die Risers	N	S	Unless integral part of the Die
8	Painting of Dies	N	S	Supplier Responsibility
9	Spare Details & Additional Parts	N	S	Tooling Managers Discretion
10	Validation Tests	N	S	Supplier Overhead
11	Steel Coatings	Y	N	Included in Tooling Quote
12	Tryouts – Design Change	Y	S	Required Navistar Change
13	Tryouts – Initial Tool Validation	N	S	Initial Tryouts only
14	Tryout Material – initial tool Validation	N	S	Initial Tryouts only
15	Part Layout / Dimensional Studies	N	S	These are PPAP costs; therefore Navistar will not reimburse these expenses.
16	Scrap Ejectors (Chutes)	N	S	Supplier Capital Equipment
17	External Stock Guides	N	S	Supplier Capital Equipment
18	Die Protection	N	S	Supplier Capital Equipment
19	Quick Change Adaption	N	S	Supplier Capital Equipment
20	Stock Bridge Adaption	N	S	Supplier Capital Equipment
21	Pneumatic/Hydraulic Controllers and Connectors	N	S	Supplier Capital Equipment
22	Robots/Pickers	N	S	Supplier Capital Equipment

## Section 6 – Machining

Reimbursable? (Y/N)      Ownership (N = Navistar   S = Supplier)

ITEM DESCRIPTION	REIMBURSABLE	OWNERSHIP	COST LIABILITY/REASONS	
1	Air Cylinders	N	S	Capital Equipment
2	Machining – Specific machining tooling items are acceptable only when special and unique to a specific part, model, or product and are not acceptable when a standard shelf type item. Must not include computer terminals, keyboards, printers, “smart” columns or electronic readouts.	N	S	Piece Price
3	Arbors	N	S	Special Part Holding
4	Broach Cutters	N	S	Supplier
5	Broach Holders	N	S	Capital Equipment
6	Duplicating Aids	N	S	Supplier
7	Drill Plates	N	N	Specific to Navistar Part
8	Cams	N	N	Specific to Navistar Part
9	Chuck Jaws	N	N	Specific to Navistar Part
10	Cutter Bodies	N	S	Supplier Capital
11	Machining Fixtures	Y	N	Part Touching Component
12	Forming Tools	N	S	Only First Complement
13	Gang Masters	N	N	Camshaft Contour
14	Grinding Wheels	N	S	Perishable Tooling
15	Grinding Wheel Tooling	N	S	Supplier Capital
16	Heat Treatment Shielding	N	S	Capital Equipment
17	Hydraulic & Pneumatic Items	N	S	Capital Equipment
18	Jigs	N	N	Only when unique to Navistar
19	Models	N	N	Acceptable only when: CAD Data is not available and model would be the “Master”.
20	Motors	N	S	Capital Equipment
21	Patterns (Paint Masks, Coat, Heat Treat)	Y	N	Paint Masks, Coat, Heat Treat
22	Spindle Heads	N	S	Capital Equipment
23	Machine Detail	N	S	Capital Equipment
24	Tryout Costs	N	S	Production material used for initial tool tryout only.

## Section 7 – Electrical

Reimbursable? (Y/N)      Ownership (N = Navistar   S = Supplier)

ITEM DESCRIPTION		REIMBURSABLE	OWNERSHIP	COST LIABILITY/REASONS
1	Dies and Details	Y	N	Required for Components Unique to Navistar
2	Fixtures	Y	N	Verification, Push Test, Continuity Fixture Blocks: only when required and unique to Navistar component.
3	Grease Application Equipment	Y	N	Capital Equipment
4	Injection Molds	Y	N	Required for Components Unique to Navistar
5	"Nesting" Fixtures	Y	N	Those hold components during (Automated/Manual) assembly operations and material handling tooling unique to Navistar requirements.
6	Test Equipment	Y	N	(Capital in Nature) Continuity Analyzers, TSK Boards, Indicators/Meters, Verification Type Equipment, etc.(Only Navistar specific)
	<b>Hardware</b>			
7	Instruments (Self Bought)	N	S	Capital Equipment
8	Computers (inc. monitor & keyboard)	N	S	Capital Equipment
9	Cabinets	N	S	Capital Equipment
10	Cables	N	S	Capital Equipment
11	Automatic Stamper's	N	S	Capital Equipment
	<b>Software</b>			
12	Operating System	N	S	Capital Equipment
13	Application Software	N	S	Capital Equipment
14	Test Code (Specific to module under test)	N	S	Capital Equipment
	<b>Test Chambers</b>			
15	Burn-In	N	S	Capital Equipment
16	Refrigeration	N	S	Capital Equipment
17	Environmental	N	S	Capital Equipment
18	Additional Requirements	N	S	Capital Equipment
19	Racks	N	S	Capital Equipment
20	Rack Fixtures	N	S	Capital Equipment
21	Test Fixtures	N	S	Capital Equipment
22	Patterns (Paint Masks)	Y	S	Films & Printing Plates (Proprietary)
23	Wire Harness Assembly Boards/Checker Test Boards	Y	N	Capital Equipment
23	Wire Test Units	N	S	Mastic Pad Units, Shrink Tubing Units, Conveyors, Ovens, etc.

## Section 8 – Gages

Reimbursable? (Y/N)      Ownership (N = Navistar   S = Supplier)

ITEM DESCRIPTION		REIMBURSABLE	OWNERSHIP	COST LIABILITY/REASONS
1	Holding Tables / Carts	N	S	Capital Equipment
2	Final Inspection Gages Only (Attribute, SPC Data Collecting, Templates)	Y	N	Final Process
3	In-Process Gages	N	S	Supplier – Part Dependent
4	Test Fixtures	N	S	
5	Poke Yoke Equipment	N	S	
6	Indicators / Meters / Sensing and Validation Equipment	N	S	
7	Test Boards	N	S	
8	In Circuit Testing Post PCB Population	N	S	
9	Statistical Process Control (SPC) Equipment	N	S	Capital

## Section 9 – Welding & Assembly Fixtures

Reimbursable? (Y/N)      Ownership (N = Navistar   S = Supplier)

ITEM DESCRIPTION	REIMBURSABLE	OWNERSHIP	COST LIABILITY/REASONS
1 Automated, "Turn Key" Welding and Assembly Equipment	N	S	Capital Equipment
2 "C" Frames	N	S	Pedestal Welders and Press Welders
3 Hydraulic and Pneumatic Items	N	S	Unless Integral Part of Fixture
4 Machine Bases	N	S	Machine Feeds, Safety Items, and Guarding
5 Masking Devices	N	N	Only First Complement
6 Mechanical Knees	N	S	Capital Equipment
7 Motors	N	S	Capital Equipment
8 Portable Welding Guns	N	S	Of Standard Design
9 Prototype Parts	N	S	
10 Spotting Models	N	S	Capital Equipment
11 Transformers and Cables	N	S	Capital Equipment
12 Tryout Expense	N	S	
13 Weld Guns	N	S	Capital Equipment
14 Weld Test Equipment / Fixtures	N	S	Capital Equipment
15 Automation	N	N	Only When within Fixtures; Fingers Only
16 Weld Timers	N	S	Capital Equipment
17 Welding and Assembly Fixtures	N	N	Only Nests and Clamping Devices
18 Tables, Frames, and other Capital Equipment	N	S	Capital Equipment
19 Casters / Wheels	N	S	Capital Equipment
20 Table Lift Devices	N	S	Capital Equipment
21 Lighting	N	S	Capital Equipment
22 Light Curtains, Safety Equipment	N	S	Capital Transfer
23 Clamping Devices	N	N	Navistar will reimburse the cost of commercially available clamps. If custom clamps / holding devices are utilized; only the cost of comparable commercially available clamps will be reimbursed. Part Touching Only. At the Discretion of the Navistar Tooling Manager.
25 Conveyors	N	S	Capital Transfer
26 Delivery Equipment	N	S	Standard Machine
27 Bowl Feeder Part Orientation Equipment	N	N	Channel Feed Only
28 Unique Carrier / Hangers	Y	N	First Set Only

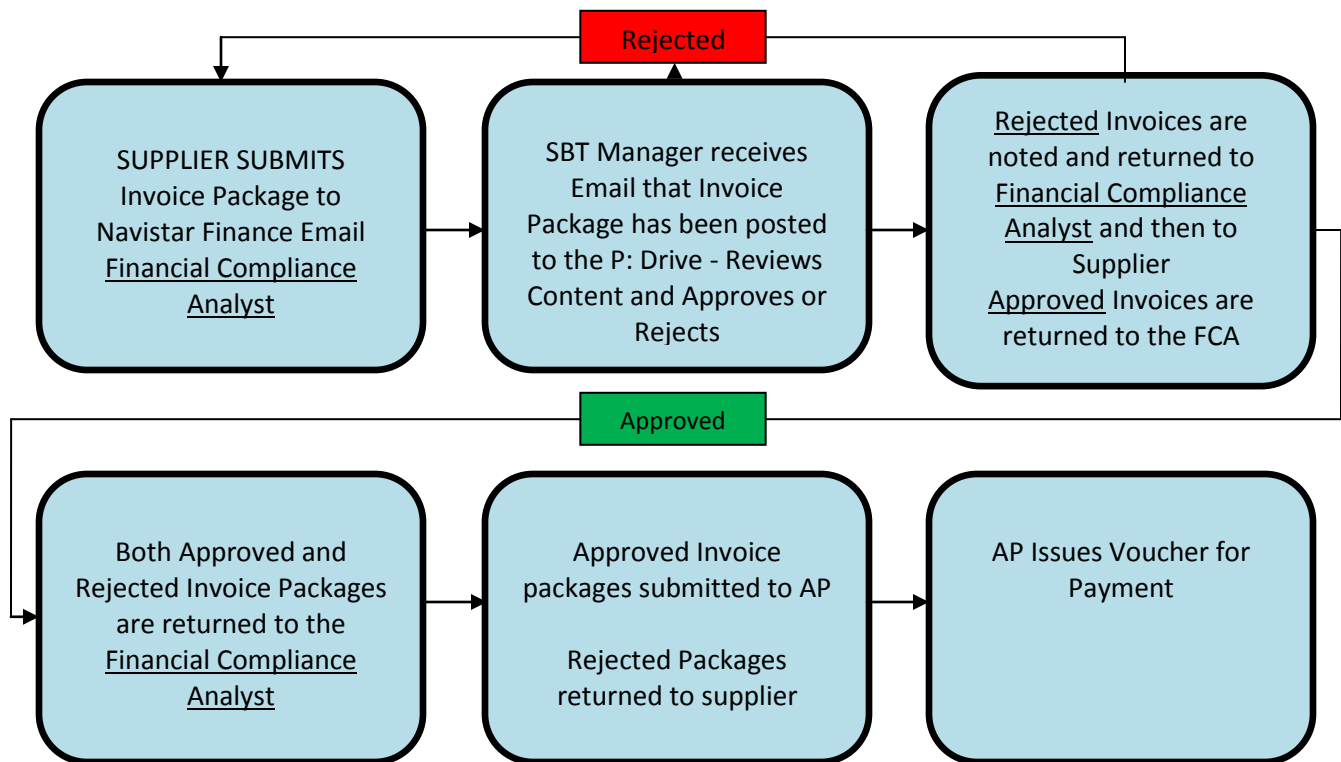
## Section 10 – Forging Casting and High Wear Tooling

Reimbursable? (Y/N)      Ownership (N = Navistar   S = Supplier)

ITEM DESCRIPTION		REIMBURSABLE	OWNERSHIP	COST LIABILITY/REASONS
1	Continuous Cavity Replacement Funds (Replacement Tooling Guidelines for Die Cast Tools)	Y	N	CCR tooling funds are forecasted by the supplier at given millstones and supported by the Navistar Refurbishment Process.
2	Replacement Cavities, Inserts, Cores	Y	N	As per Guideline
3	Replacement Retainer(s)	N	S	Supplier
4	Ejector Pins	N	S	Supplier
5	Maintenance of the Die Cast Machine Trim Press	N	S	Supplier
6	Trim. Die, Replace Punches, Blades, etc.	Y	N	
7	Robots	N	S	Capital Equipment
8	Clean and Lube Fixtures, Auto Sprayers, Auto Lube, etc.	N	S	Capital Equipment
9	Casting Machine Components – Replacement	N	S	Capital Equipment
10	Spray Manifolds – Replacement	N	S	Capital Equipment
11	Navistar Engineering Design Changes – EC	Y	N	Generally EC's are covered by a separate Tool Purchase Order and not from the replacement fund. However, in the event an insert would be obsolete due to an engineering change, the replacement funds accumulated at that point for normal Cavity replacement.
12	Try Out Costs	N	S	
13	Internal Indirect Labor	N	S	Overhead
14	Back up Tooling	N	S	Part of Die Maintenance
15	Normal Tool Maintenance	N	S	

# Navistar Invoice Procedure

## SBT - Invoice Package Process Flow



AP – Accounts Payable  
 SBT– Supplier Based Tooling  
 FCA – Financial Compliance Analyst

## SBT - Invoice Package Requirements

### ➤ **Contents of Typical (Final) Invoice Package**

- Invoice
- Copy of Purchase Order
- Signed Tool Acceptance Report (TAR) (see Tool Acceptance Report Procedure)
- Signed Part Submission Warrant (PSW)
- Pictures of the Tooling (within the Guideline set forth for photo submission.)

### ➤ **Additional Invoice Requirements**

- May also include tooling CAD files (upon request)
- May also include Lien Release Letter (upon request)

### ➤ **Payment Approval**

- 100 % Payment will only be made after the following two conditions are met:
  - Completed TAR requirements and TAR forms approved by Supplier Tooling Manager
  - PSW is “Approved” or authorization from Tooling Manager

**Note:** *Payment is at the discretion of the SBT Manager.*



## SBT - Requirements for Submitting an Invoice Package

- All invoice packages must be submitted as a complete package – partial submissions will be returned
- Invoice packages should only be submitted to the Financial Compliance Analyst
- Separate invoice packages must be submitted for different currencies
  
- Invoice packages must be submitted by the following method:

**Email – Invoice Delivery Method**

- All TAR Forms should be submitted in Excel Format
- All other Files should be in PDF or JPEG format
- Submit a minimum number of electronic files containing all Documents including compressed Tooling Pictures emailed to:  
[SBTAPSCAN@Navistar.com](mailto:SBTAPSCAN@Navistar.com)

**Any other Invoice Delivery methods will delay payment**

- To make any other arrangements for alternate Invoice package delivery contact the Navistar Financial Compliance Analyst:

Carlinda McGrew, Lisle Phone Number – (331) 332-4781

Address:

Navistar World Headquarters  
Supplier Based Tooling – Finance  
Attn: Carlinda McGrew  
Building 2  
2601 Navistar Drive  
Lisle, IL 60532

