NPQP Category 9

Change Management

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9 - Change Management

Category Purpose:

- **Manage potential risks** associated with changes to product, process, or facility site

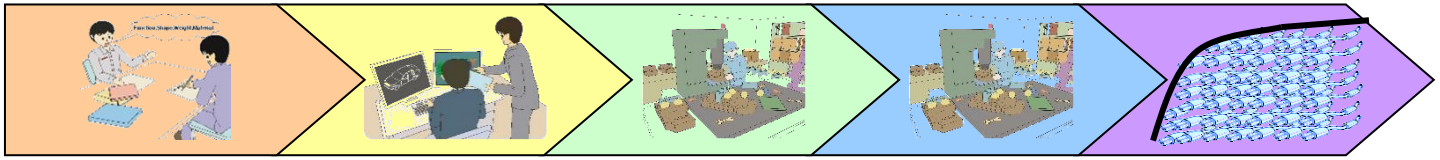
Activities:

9.1 Design Change Management

9.2 Process / Facility Site Change Management

9 - Change Management

Timing:



	Phase 1	Phase 2	Phase 3	Phase 4	Phase 5
9.1 Design Change Management					
9.2 Process/ Facility Site Change Management					

9 - Change Management

Basic Change Management Requirements

- The supplier shall have a change management system which includes:
  - Planning for the change
  - Risk analysis & management
  - Product Verification & Validation activities

- Manage change proposals and adoption to ensure that supplier do not adversely affect Nissan's quality, cost, or delivery.
- Production Part Approval from Nissan is mandatory before shipment of any change affected product.

9 - Change Management

9.1 Design Change Management

9.2 Process / Facility Site Change Management

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9.1 - Design Change Management

Activity Purpose:

- Manage the contents of Design Changes in order to ensure that there is no negative impact on quality, cost or delivery.

Key Points of Activity:

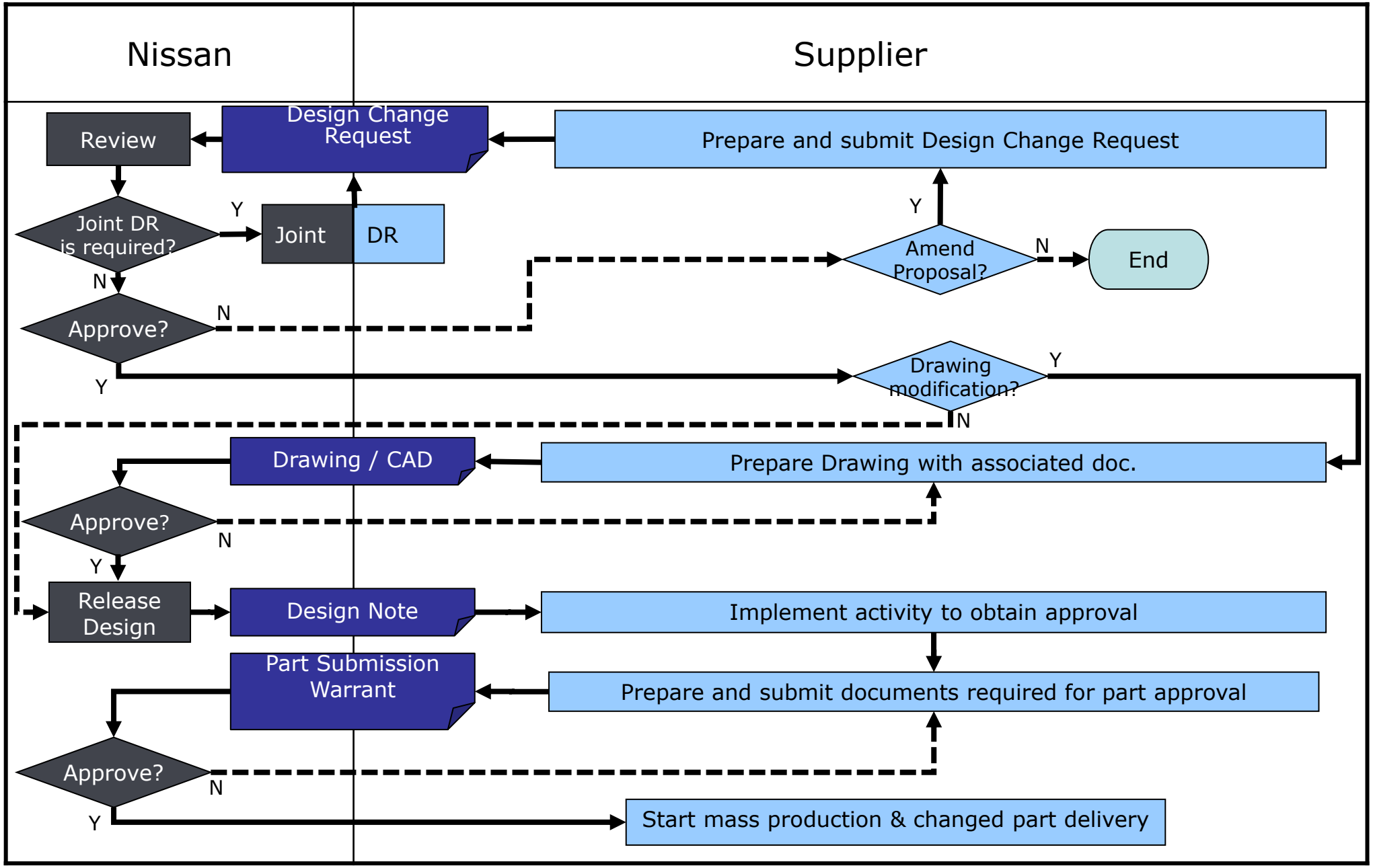
- Design Change Management covers **all design changes made by the tier 1 supplier or their supply chain (including Tier N software change)**
- DCR submission is needed for all design change, even the changing contents are not mentioned on the proposal drawing.
- Permission to proceed with design changes will only be granted through **a design note** issued by Nissan.
- Design change request shall be submitted to Nissan at least 30 days before the date of the change.

9.1 - Design Change Management

Output Documents & Submission Timing

	Phase 1			Phase 2			Phase 3			Phase 4			Phase 5		
	L	M	H	L	M	H	L	M	H	L	M	H	L	M	H
Design Change Request (DCR)							(1)	(1)	(1)	(1)	(1)	(1)	(1)	(1)	(1)

9.1 - Design Change Management



9 - Change Management

9.1 Design Change Management

9.2 Process / Facility Site Change Management

9 – Change Management
9.2 – Process/Facility Site Change Request

Activity Purpose:

- To **manage** the introduction of Process / Facility Site changes in order to ensure that there is no negative impact on quality, cost or delivery.

Key Points of Activity:

- The scope of Process / Facility Site Change Management covers **all changes** made by the **tier 1 supplier or their supply chain.**
- The supplier must ensure that **all requests** for Process/ Facility site changes are **authorized** by Nissan **prior to any change taking place.**

Important note: For Process Changes, the Process/Facility Site Change Request document shall be submitted **at least 3 months before initiation of any physical change or move, unless otherwise agreed with Nissan.**

9 – Change Management
9.2 - Process - Facility Site Change Request

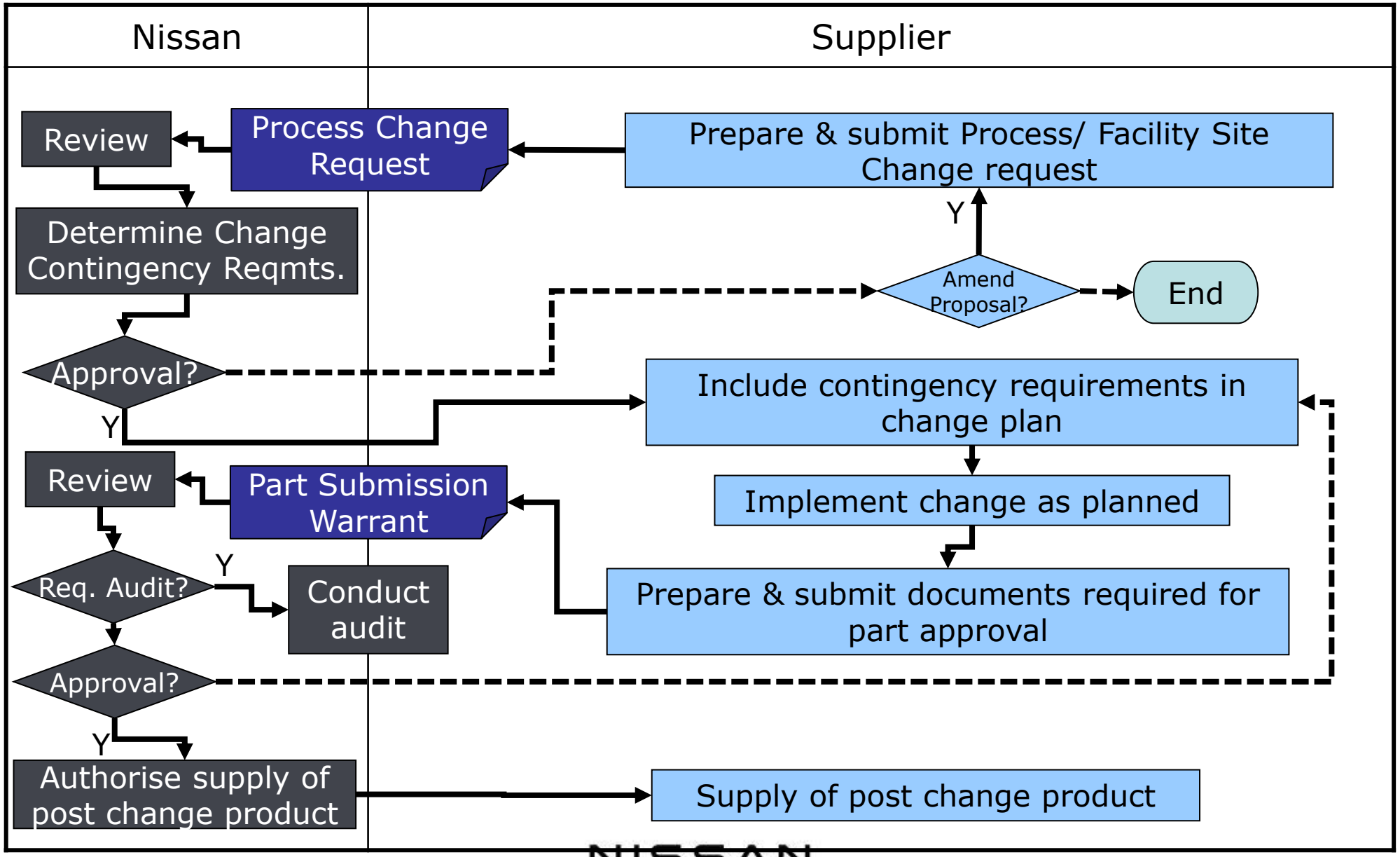
Output Documents & Submission Timing

	Phase 1			Phase 2			Phase 3			Phase 4			Phase 5		
	L	M	H	L	M	H	L	M	H	L	M	H	L	M	H
Process/ Facility Site Change Request													(1)	(1)	(1)

The Tier 1 supplier or its sub-supplier shall not carry out any Process / Facility site changes during Phase 4 and Phase 5 Ramp-Up, unless otherwise agreed by Nissan.

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9 – Change Management
9.2 - Process - Facility Site Change Request



9.2 - Process - Facility Site Change Request

Points to Consider for Process Facility Site Change Management

① The supplier shall have a change management system which includes, schedule for the changes, risk analysis & management, product verification & validation activities.

② Once the adoption of the change is confirmed as successful, mass production part approval from Nissan is necessary before shipment of any change affected product.

③ The supplier shall ensure that all requests for Process/Facility site changes are authorized by Nissan prior to any change takes place.

④ The Process / Facility Site Change Request document shall be submitted 3 months before implementation of any change.

⑤ The Tier 1 supplier or its sub-supplier shall not carry out any Process / Facility site changes during Phase 4 and Phase 5 Ramp-Up.

⑥ If the Tier 1 supplier or their sub-suppliers will make a Process / Facility site change, the Tier 1 supplier shall submit a Process/ Facility Site Change Request document to the relevant Nissan department. Example of changes that require Nissan authorization are described below.

⑦ The Process / Facility Site Change Request document shall be submitted to the first customer in Nissan, if it has effect on several plants in Nissan.

⑧ The supplier shall provide information of all planned changes including case of not necessary submission Process / Facility Site Change Request on Nissan requirement.

9.2 - Process - Facility Site Change Request
『Definition of the Necessity of PFCR Submission①』

Example of Process Change				Activity level (required)		Remark
	1st layer			Review with NISSAN (Submit Doc.*1).	Supplier self-review under Tier 1 resp.	
		2nd layer				
			3rd layer			
Machine	Production site change					The left also applies when returning to a factory/process that has manufactured the product in the past and has been suspended or abolished.
		Relocation/Move to a different site				
			To another site owned by the parent company	X	X	
			To a different company (out sourced)	X	X	
		Relocation/Move within the current site				
			Layout Change	X	X	
			Relocate production line (inc inspection process)	X	X	
			Newly developed or Expansion to the current production line (inc inspection process)	X	X	
		Process sequence (inc adding or eliminating process steps)		X	X	
	Machine/Equipment on the production line change (inc inspection machine)					
		Installing new equipment		X	X	
		Addition or replacement of machine/equipment		X	X	
		Machine/Equipment parameters (except calibration in daily checking)		X	X	
		Modification of existent machine/equipment		X	X	
		Repairs (Unplanned maintenance and repairs)			X	No effect to process/product characteristics by PM*2).
		Planned maintenance and repairs			X	

*1) Doc.; Process / Facility Site Change Request, *2) PM; Preventive Maintenance

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9.2 - Process - Facility Site Change Request
『Definition of the Necessity of PFCR Submission②』

Dies/ Molds change			
	Addition or replacement of new dies/molds	X	X	
	Modification of existent dies/molds	X	X	
	Repairs (Unplanned maintenance and repairs)		X	No effect to process/product characteristics by PM*2).
	Planned maintenance and repairs		X	
Tools change				
	Addition or replacement of new tools	X	X	
	Modification of existent tools	X	X	
	Repairs (Unplanned maintenance and repairs)		X	No effect to process/product characteristics by PM*2).
	Planned maintenance and repairs		X	
Inspection/ measurement tools change				
	Addition or replacement of dedicated inspection / measurement tool (specific gauge etc)	X	X	
	Modification of special inspection/measurement tool	X	X	
	Addition or replacement of general inspection/measurement tool (vernier caliper,micrometer etc)		X	
	Modification of general inspection / measurement tool (vernier caliper,micrometer etc)		X	
	Repairs (Unplanned maintenance and repairs)		X	No effect to process/product characteristics by PM*2).
	Planned maintenance and repair		X	

*1) Doc.; Process / Facility Site Change Request, *2) PM; Preventive Maintenance

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9.2 - Process - Facility Site Change Request
『Definition of the Necessity of PFCR Submission③』

Method	Working method change			
	Assembling/Processing method (welding, surface finishing, heat treating, etc)	X	X	Contact NISSAN responsible dept if logistics and/or packaging method will change.
	Inspection method			
	Change/Eliminate inspection process (inc specification change)	X	X	
	Transporting method between process and process		X	
	Storing method			
	Product, Work-in-process, Component, Raw material, Indirect material		X	
Material	Indirect material change (Those that do not become part of the product)			Submit "Design change request" if material changes (Including materials such as grease, paint, welding rod etc.).
	Component of indirect material (cleaning agent, degreasing agent, etc)	X	X	
	Supplier of indirect material (inc relocation)	X	X	
Man	Assignment of new worker		X	
	Worker's shift change		X	
	Qualified worker change			
	Assigned workers working on special characteristic features (NPQP requirement)		X	

(But are not limited to)

*1) Doc.; Process / Facility Site Change Request, *2) PM; Preventive Maintenance

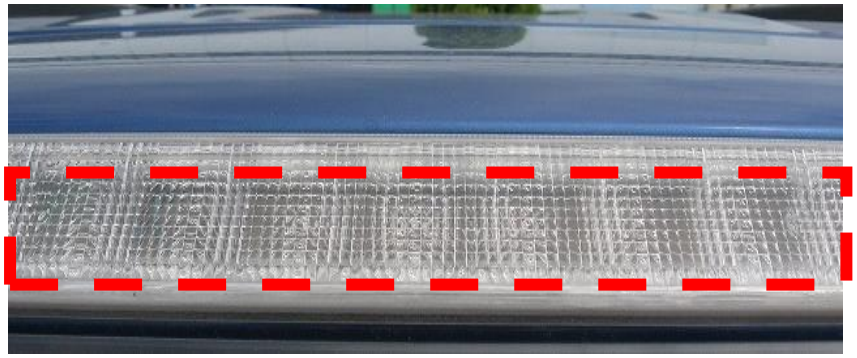
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Examples of Inadequate Change Management(Japan)
:High Mount Stop Lamp

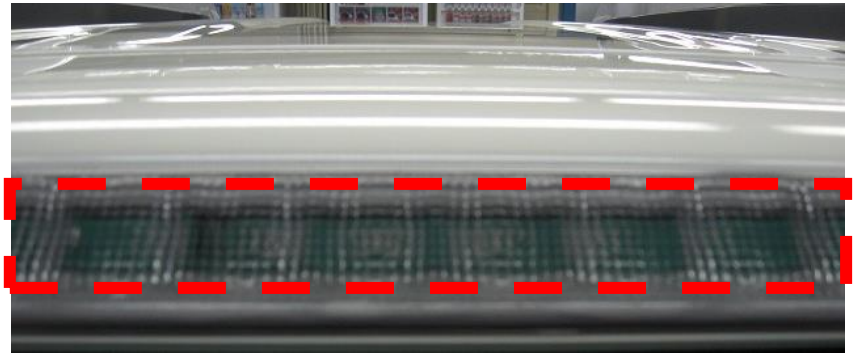
Secondary Supplier　No Standards　No Reporting

Before



Color of the PWB: Brown

After



Color of the PWB: Green

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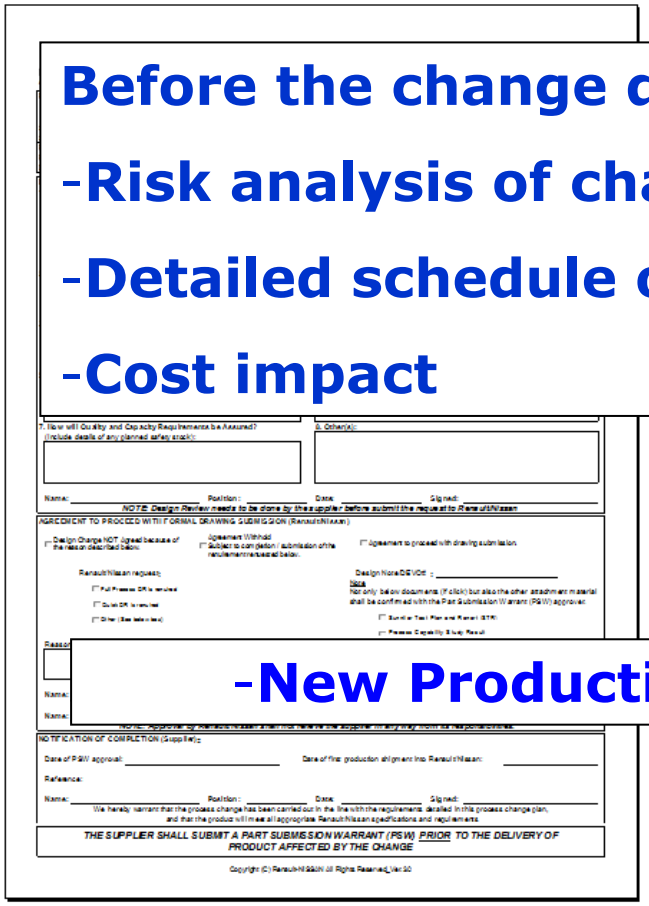
Before the change decision:

-Risk analysis of change

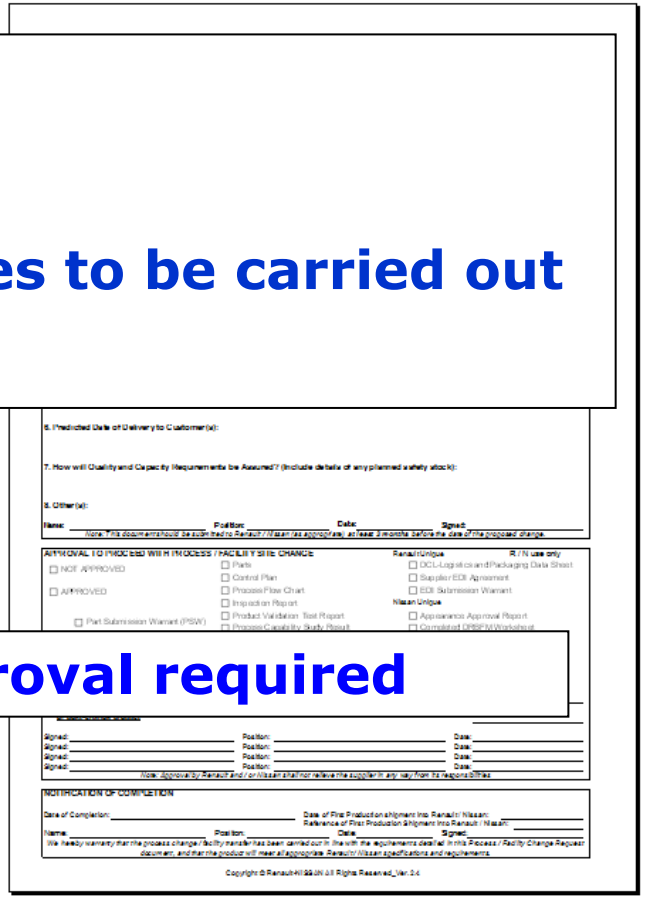
-Detailed schedule of all activities to be carried out

-Cost impact

-New Production Part Approval required



Design Change



Process/Facility Site Change

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