



IVECO • GROUP

Supplier Quality Scorecard Rules

Warning: this is just a transduction of the former Supplier Quality Scorecard Rules

Contents

Quality Score and Rating

Quality KPI's

PIQ

PPM

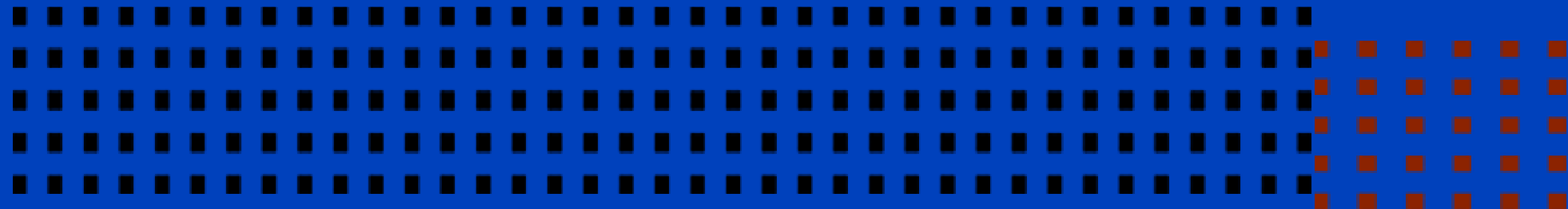
Countermeasure

Top Worst Supplier

WCM

Sustainability

Quality Score and Rating



QUALITY RATING SYSTEM

Supplier Scorecard is based on:

- Rating scale from **0 to 100** for each product/supplier manufacturing location.
- **Monthly** evaluation for each supplied product

Points will be subtracted from initial amount of **100** in accordance to the customer rules and criteria shown in this document.

Suppliers have the possibility to see their Quality performances extracting the Quality Scorecard from SQP EVO system.

QUALITY RATING SYSTEM

Data source :

SQP_{evo}
Supply Quality Performance

Supplier Quality performance evaluation is a criteria that will be used in the **sourcing process** for development of new or existing designs.

The Final Status for every supplier code will be:

Green**Ok to proceed**

if the Final Score (Supplier Rating) will be ≥ 80 .

Yellow**Conditional Ok to proceed**

(approved Business Case is needed)

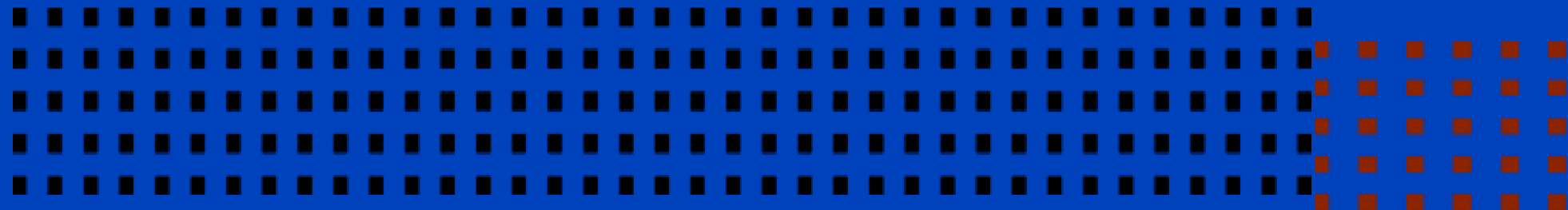
if the Final Score will be ≥ 60 and < 80)

Red**Supplier cannot be recommended.**

if the Final Score will be < 60 or in case of:

- **New Business Hold (NBH)** status;
- **Missing** ISO Quality Certification;

Quality KPI's



QUALITY PERFORMANCE

It's evaluated through an overall quality score that includes the contribution of different KPI as PIQ, PPM, Customer countermeasures (CSL), Supplier responsiveness on SQP usage, APQP and PPAP results, WCM audit score

Topics	KPI'S
Quality Index	PIQ / PPM
Customer Countermeasures	CSL's Qty, TWS notifications
SQP Responsiveness	SR %
APQP and PPAP	Program Review and Process Audit score, PPAP results
WCM	Audit Score

- Rating scale from 0 to 100 for each product/supplier/manufacturing location.

PERFORMANCE INDEX QUALITY (PIQ)



The KPI is represented by the following value:

PIQ = Ratio between the total number of Quality Bills multiplied by their Weight (PQ) and the total number of delivered parts, expressed in parts per million.

$$PIQ = \frac{PQ}{\text{Quantity of delivered parts}} \times 10^6$$

PIQ Target is assigned to all product families

QUALITY IMPACT (PIQ Quality 6M rolling, each product family):

Out of target value	>0 ≤ 5%	>5% ≤ 50%	>50% ≤ 100%	> 2 times target	> 3 times target
Subtracted points qty.	0	5	10	15	25

Special rule for “Low Volume” Suppliers: for a supplier code product family with a PIQ value out of Target, having a PQ ≤ 60 on 6 months rolling (without any bill 40Q) , 15 points as maximum sub-tractable from the scorecard.

NON CONFORMING PARTS PER MILLION (PPM_{NC})



The KPI is represented by the following value:

PPM_{NC} = Ratio between the Quantity of non-conforming parts at the total number of delivered parts expressed in parts per million. A non-conforming part is any part that does not meet customer specifications before any reworking/reprocessing operations.

$$PPM_{NC} = \frac{\text{Non Conforming Quantity}}{\text{Quantity of delivered parts}} \times 10^6$$

PPM Target is assigned to all product families

QUALITY IMPACT (PPMNC 6M rolling) :

Out of target value	>0 ≤ 5%	>5% ≤ 50%	>50% ≤ 100%	> 2 times target	> 3 times target
Subtracted points qty.	0	5	10	15	25

Special rule for “Low Volume” Suppliers: for a supplier code product family with a value of PPM NC out of Target, but with a number of Not Conforming parts ≤ 10 on 6 months rolling (but not linked to any bill 40Q) , 15 points as maximum sub-tractable from the scorecard

CUSTOMER COUNTERMEASURES - CSL



Controlled Shipping Levels (CSL) are customer countermeasures with three different levels (CSL1, CSL2, CSL3) according to the gravity and repetitions of non-conformities detected in the supplies.

CSL1 (Controlled Shipping Level 1): An additional inspection process focused on a specific set of product characteristics 100% checked by supplier.

CSL2 (Control Shipping Level 2): The supplier must appoint a qualified third-party Certifying Body that ,focused on a specific set of product characteristics, must carry out 100% checks on the batches, to be delivered to the Customer Plants.

CSL3 (Control Shipping Level 3): after confirming the systematic inadequacy of the production and/or control system , supplier must appoint a qualified third-party Certifying Body, which, besides all the activities required in a CSL2, will provide the necessary support for a guided development of supplier processes (guided growth).

QUALITY IMPACT (CSL1, CSL2, CSL3, 6M Rolling):

10 points subtracted for each CSL1 in status “open” at the Scorecard date;

25 points subtracted for each CSL2 in status “open” at the Scorecard date

25 points subtracted for each CSL3 in status “open” at the Scorecard date;

Supplier will be considered **RED** if this condition will be presentt:

- Nr. of **CSL 1** opened **>2**

TOP WORST SUPPLIERS NOTIFICATION

Data source :

SQP_{evo}
Supply Quality Performance

Top Worst Suppliers are identified through a risk assessment coming from the QA Matrix and Supplier Quality Top Contributors based on PQ/PIQ performance.

Reporting of TWS status is delivered through a monthly and yearly report in order to track improvements / recurrences.

If a Supplier is retrieved in the report more than four times along the year, an official communication letter is sent by Supplier Quality to the supplier and – consequently - **SQP bill 41Q** item having impact on supplier scorecard is issued into SQP system.

If a Supplier does not appear in the report for more than four consecutive months, it will be removed from the list.

QUALITY IMPACT (TWS, 6M Rolling):

10 points subtracted for each TWS notification at the Scorecard date;

PROGRAM MANAGEMENT - APQP

Data source :



Program Review of **APQP** components is a periodical meeting with the goal to put in evidence, as early as possible, potential job stopper or risk for the project and to identify actions to prevent potential quality issues. Red status of Process Planning Reviews shall be escalated at platform leadership level for evaluation and risk management.

Process Audit is a supplier process assessment applied on **APQP** components. The output is the early identification of supplier process control plan's weak points that deserve corrective actions within defined periods. Until a PA is positive, the process audited cannot be considered fully stable and in control.

QUALITY IMPACT - APQP trouble issue 31Q (6M Rolling):

5 points subtracted for each Program Management (APQP) bill opened due to:

- *Process Planning Review / Process Audit (PA) with score <3 - with open issues having a clear Supplier responsibility (see QPS08018 - Annex1 trouble issue 31Q1 31Q2) or in case of missing responsiveness by suppliers*

PROGRAM MANAGEMENT - PPAP

Data source :



The Production Part Approval Process (**PPAP**) is a multidisciplinary activity that defines activities and responsibilities in order to ensure that customer requirements (in terms of specifications and design) have been understood and parts are compliant with them.

QUALITY IMPACT - PPAP trouble issue (6M Rolling):

- **5 points subtracted** for each Program Management bill opened due to:
 - *Rejected PPAP level 4/5 (see QPS08018 - Annex1 trouble issue 31Q3) due to a clear Supplier responsibility*
- **2 points subtracted** for each Program Management bill opened due to:
 - *Rejected PPAP level 1/2/3 (see QPS08018 - Annex1 trouble issue 32Q) due to a clear Supplier responsibility*

SUPPLIER RESPONSIVENESS (SR%)

KPI that evaluates the supplier involvement in problem resolution, through the usage of SQP EVO customer system

SR% - 6M Rolling

Percentage value based on the number of Bills filled with supplier containment action on the total number of Bills opened (N).

QUALITY IMPACT :

- **5 points** if the responsiveness is $< 70\%$ of the total bills opened
- **2 points** if the responsiveness is: $70\% \leq SR\% \leq 80\%$

SUPPLIER COLLABORATION (CB) - 6M Rolling

Collaboration measures how many times the suppliers has not shown a cooperative attitude in the communication process.

KPI is the total quantity of Collaboration bills opened (see QPS08018 - Annex1 trouble issue 19C-35C-36C).

This information is just for the record, it doesn't subtract points from the score.

ADDITIONAL CRITERIA

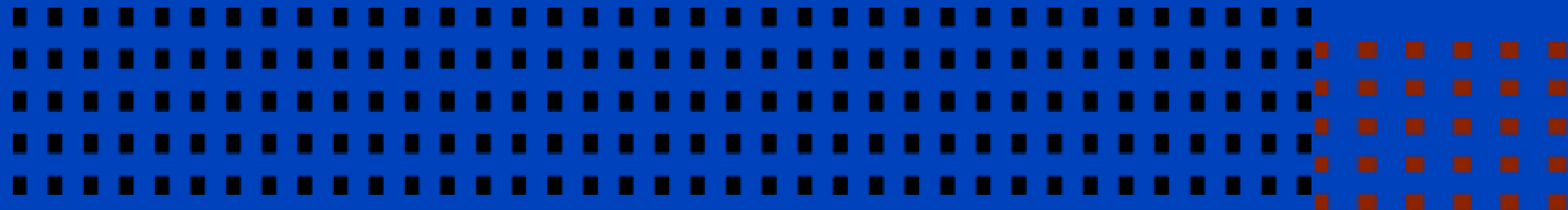
Supplier will be considered RED in Scorecard if at least one of the following conditions will be present :

- Nr. of **CSL 1** opened **>2**
 - **NBH** (New Business Hold) **= Y**
 - **ISO 9001** (AG, CE, IVECO BUS and Special Vehicles) **= N**
 - **IATF 16949** (FPT, IVECO Truck & Commercial Vehicles) **= N**
-

Additional informations are :

- **ISO 14001** : Missing certification is just for the record; it doesn't subtract points from the score
- **WA** : Warranty Agreement availability and contract typology.
 - Percentage of Turn Over (PoT)
 - Claim by Claim (CBC)
 - Technical Factor (TF)

World Class Manufacturing



WORLD CLASS MANUFACTURING :

This KPI is based on Audit results, and calculated only for those Suppliers involved by IVECO Group WCM program.

QUALITY IMPACT :

$\Delta\%$ * is the difference between Supplier Self-assessment Score and the Official Audit Score.

$\Delta\%$ *	0 ≤ 25%	>25% ≤ 50%	>50%
Subtracted points qty.	0	0	5




RED Rule 1: If the $\Delta\%$ * between Supplier Self-evaluation and the Official Audit Score is more than 50%, **5 points** will be subtracted to the scorecard and WCM red status will be assigned.
Note: this rule is not applicable to the suppliers having a score ≥ 50 points.

RED Rule 2: If the time between the audits is over 12 months due to supplier unavailability or deletion, **10 points** will be subtracted to the scorecard and WCM red status will be assigned.

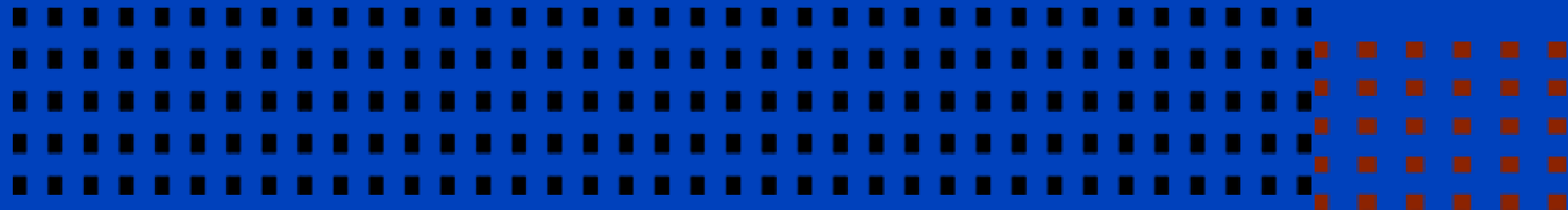
Rule 3 (valid only for suppliers with a score ≥ 50) : If the last audit score is lower than the previous one **5 points** will be subtracted to the scorecard. WCM green status will be maintained.

SCORECARD BONUS PACK (10 points total – one shot):

If the Audit results are aligned to the target, a bonus pack of 10 points will be assigned to the Supplier Scorecard with the following criteria :

-  **FIRST AUDIT** : +5 points will be added if 1° Audit Score is ≥ 10
-  **SECOND AUDIT** : +3 points will be added if 2° Audit Score is ≥ 15
-  **THIRD AUDIT** : +2 points will be added if 3° Audit Score is ≥ 24

Sustainability



SUSTAINABILITY

This KPI is based on supplier collaboration, self assessment and customer audit score, and calculated only for those Suppliers involved by IVECO Group Sustainability Questionnaire.

- **Availability of the filled Sustainability Questionnaire (Y/N status);**
it's just for the record, it doesn't subtract points to the score.
- **Sustainability Supplier Score** based on a Supplier self-evaluation;
it's just for the record, it doesn't subtract points to the score.
- **Sustainability Audit Score** based on Customer evaluation;
 - *Audit result is considered **Red** if the value is ≤ 50 ;
it's just for the record, it doesn't subtract points to the score.*
 - *Audit result is considered **Yellow** if the value is > 50 and ≤ 70 ;
it's just for the record, it doesn't subtract points to the score.*