

Nueva versión

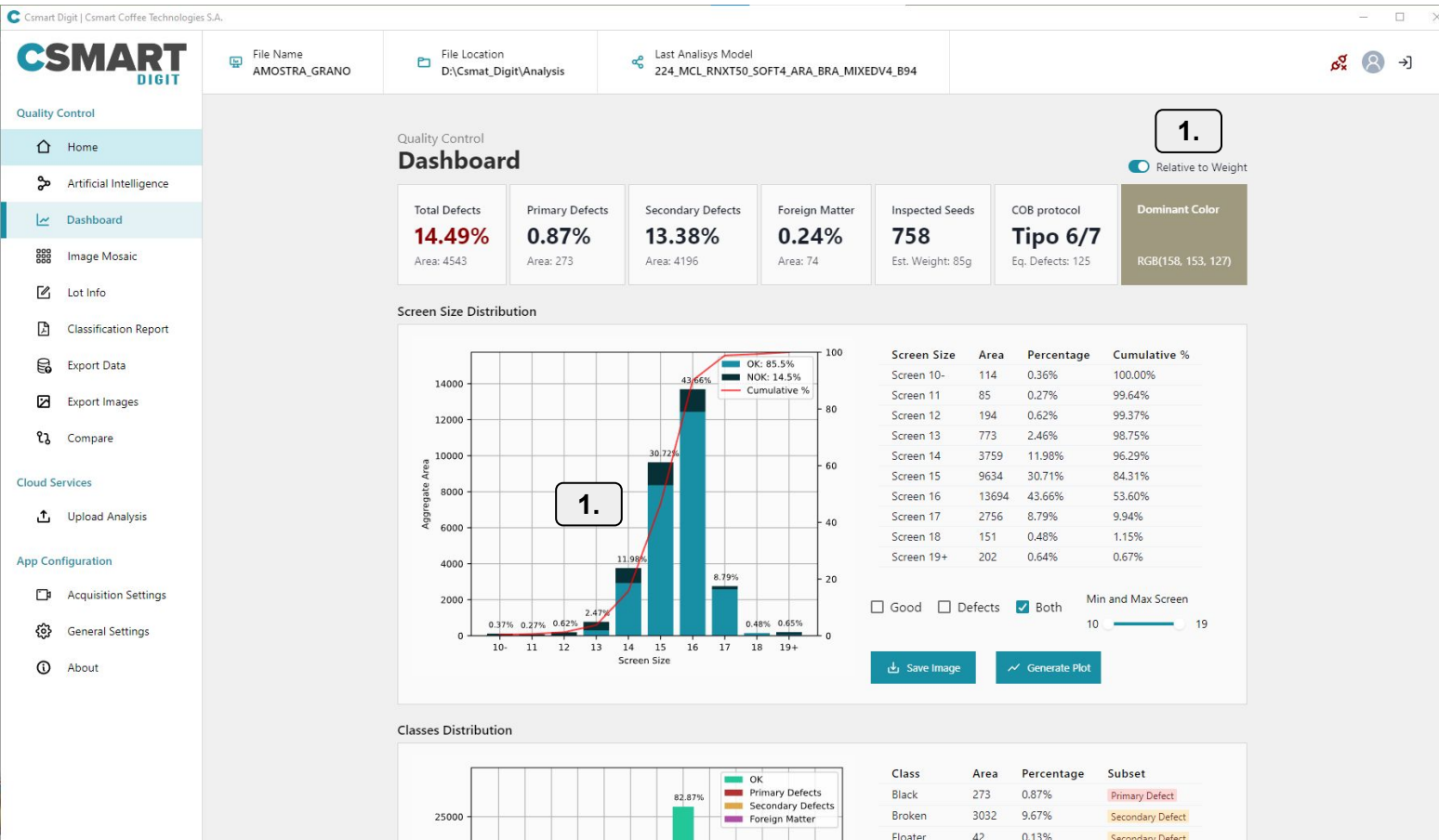
# Aplicación Desktop

Versión menor - V3.0.10

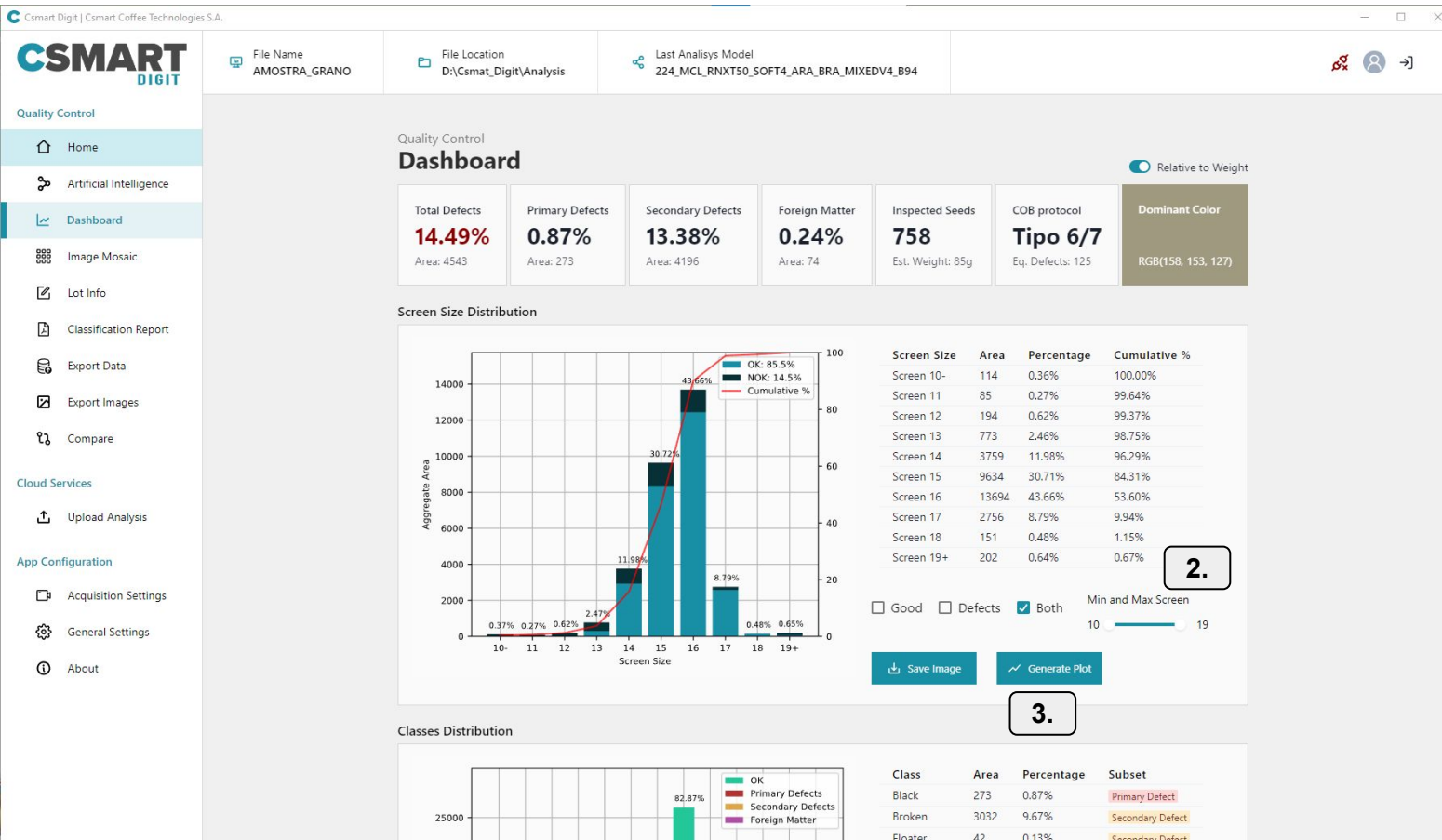
2024/07/19

# Dashboard

1. Se puede seleccionar un nuevo botón de cambio etiquetado **Relative to Weight** y **Relative to Count** para cambiar todos los cálculos relacionados con la distribución del tamaño del tamiz. Cuando se selecciona **Relative to Count**, todos los gráficos y tablas reflejan la aparición de cada semilla en relación con la aparición total por recuento. Por otro lado, cuando se selecciona **Relative to Weight**, el porcentaje se calcula en función del área de cada semilla con respecto al área total de la muestra, que está intrínsecamente correlacionada con el peso.



# Dashboard



File Name  
AMOSTRA\_GRANOFile Location  
D:\Csmat\_Digit\AnalysisLast Analysis Model  
224\_MCL\_RNXT50\_SOFT4\_ARA\_BRA\_MIXEDV4\_B94

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## Dashboard

☒ Relative to Weight

Total Defects

**14.49%**

Area: 4543

Primary Defects

**0.87%**

Area: 273

Secondary Defects

**13.38%**

Area: 4196

Foreign Matter

**0.24%**

Area: 74

Inspected Seeds

**758**

Est. Weight: 85g

COB protocol

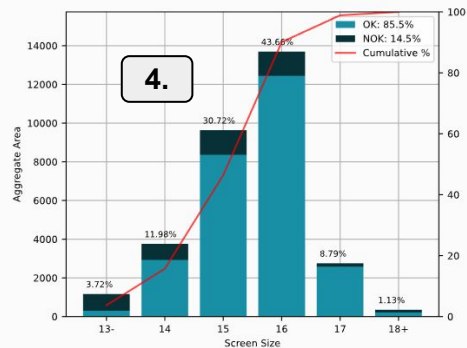
**Tipo 6/7**

Eq. Defects: 125

Dominant Color

RGB(158, 153, 127)

## Screen Size Distribution



Screen Size	Area	Percentage	Cumulative %
Screen 13-	1168	3.72%	100.00%
Screen 14	3759	11.98%	96.28%
Screen 15	9634	30.71%	84.30%
Screen 16	13694	43.66%	53.59%
Screen 17	2756	8.79%	9.93%
Screen 18+	354	1.13%	1.14%

☐ Good ☐ Defects ☒ Both Min and Max Screen  
13  18

Save Image

Generate Plot

**4.**

## Classes Distribution



Class	Area	Percentage	Subset
Black	273	0.87%	Primary Defect
Broken	3032	9.67%	Secondary Defect
Floater	42	0.13%	Secondary Defect

## Dashboard

4. Ejemplo de gráfico y tabla ajustados, limitados a los tamices 13 y 18.

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## Dashboard

5.

☒ Relative to Weight

Total Defects

**14.49%**

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Primary Defects

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**0.24%**

Area: 74

Inspected Seeds

**758**

Est. Weight: 85g

COB protocol

**Tipo 6/7**

Eq. Defects: 125

Dominant Color

RGB(158, 153, 127)

## Screen Size Distribution

## Expected Screen Size Distribution

Screen Size	Expected Count (300g)
Screen 10 and less	3738 seeds
Screen 11	3524 seeds
Screen 12	3309 seeds
Screen 13	2970 seeds
Screen 14	2910 seeds
Screen 15	2775 seeds
Screen 16	2535 seeds
Screen 17	2235 seeds
Screen 18 and more	1920 seeds

Close

# Dashboard

5. La estimación del peso considera la distribución esperada del tamaño del tamiz en relación con un peso conocido. Esta información se asocia al archivo del modelo AI, permitiendo que cada modelo tenga una distribución diferente. Los usuarios deben crear esta tabla para sus modelos. Con base en la distribución esperada, es posible estimar el peso de la muestra analizada. Nótese que no es posible asumir que todas las semillas que pasan por el equipo serán registradas y por lo tanto la distribución esperada sirve como variable base para el resultado correcto de los métodos de clasificación.

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## Classification Methods

Total Defects

**115**

Weight Factor: 3.53

Method	Equivalent Defects	Type
COB	125	Tipo 6/7
NY	125	NY 6

6.

8.

7.

Class	Original Count	Weighted Count	Factor	Equivalent Defects
Black	7	25	1 to 1	25
Broken	79	279	5 to 1	56
Floater	1	4	5 to 1	1
Fox Bean	19	68	0	0
Husk Small	0	0	3 to 1	0
Husk Medium	0	0	3 to 1	0
Husk Large	0	0	1 to 1	0
Immature	6	22	5 to 1	5
Insect Dam.	10	36	5 to 1	8
Ok	624	2203	0	0
Parchment	2	8	2 to 1	4
Pod	0	0	1 to 1	0
Rocks Small	0	0	3 to 1	0
Rocks Medium	2	8	1 to 2	16
Rocks Large	0	0	1 to 5	0
Shell	8	29	3 to 1	10
Sour	0	0	2 to 1	0

## AI Parameters

Prediction Entropy

Average Entropy 0.78%

Confidence Level High Confidence

True Positives

**112**

Ratio: 14.78%

True Negatives

**643**

Ratio: 84.83%

False Positives

**0**

Ratio: 0.0%

False Negatives

**3**

Ratio: 0.4%

# Dashboard

6. Según el **Peso Estimado** y el **Peso Requerido** del método de clasificación, se aplica un **Factor de Peso**.

7. Todas las ocurrencias de cada defecto se multiplicarán por el **Factor de Peso**, generando un **Recuento Ponderado**. A partir de esto se aplica el factor de clase, definido por el método elegido, para determinar los **Defectos Equivalentes** por clase y total.

8. Este procedimiento se aplica a todos los métodos presentes en el modelo de IA y se puede acceder a él en la vista de pestañas.



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## Non Defective Seeds

OK Classes

643 Seeds | 85.51%

## Dominant Color

RGB(158, 153, 127)



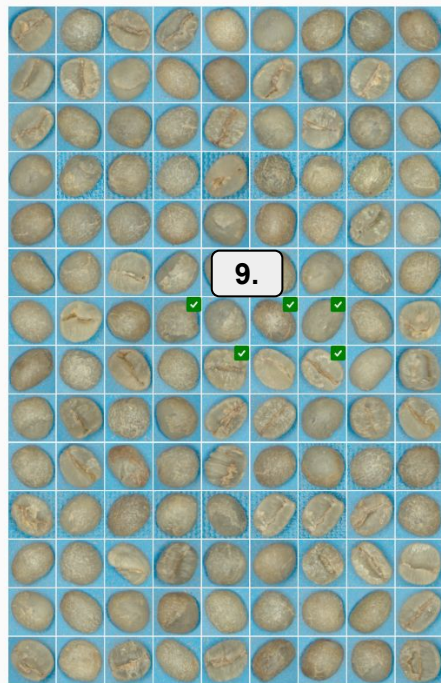
Color by Class



Draw Perimeter



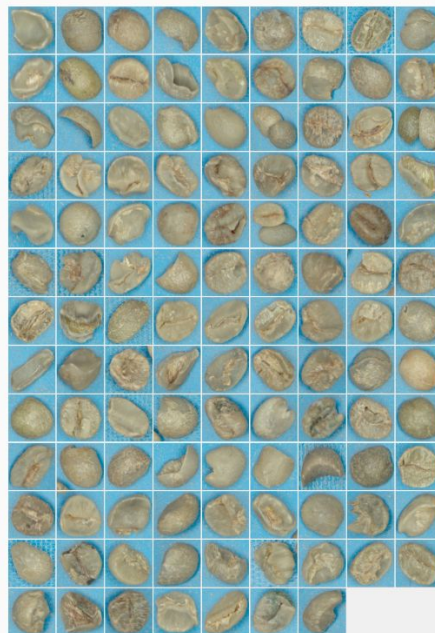
Draw Min Axis



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Edit Selection

10.



## Defective Seeds

NOK Classes

115 Seeds | 14.49%

## Dominant Color

RGB(158, 153, 126)



Color by Class



Draw Perimeter



Draw Min Axis

&lt; Page 1 / 1 &gt;

11.

Clear Selection

# Image Mosaic

9. Al presionar **CTRL** y hacer clic en las celdas de la cuadrícula, puede seleccionar varias imágenes a la vez. Se muestra una marca de verificación verde en cada semilla seleccionada.

10. Al presionar **Editar Selección**, se abrirá un menú lateral que permitirá al usuario cambiar la clase de todas las imágenes seleccionadas a la vez.

11. Para restablecer la selección, el usuario puede hacer clic en el botón **Borrar Selección**.

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## Non Defective Seeds

OK Classes

643 Seeds | 85.51%

## Dominant Color

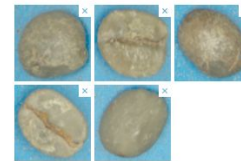
RGB(158, 153, 127)

☐ Color by Class☐ Draw Perimeter☐ Draw Min Axis

&lt; Page 1 / 6 &gt;

Edit Selection

## Seed Features



## Classification

Select class

12.

# Image Mosaic

12. Utilice el menú de selección para asignar una nueva clase a las imágenes seleccionadas.



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## Quality Control

**Classification Report**

1. Select the report language:

English

2. Specify if the percentage refers to count or weight:

☒ Relative to Weight

3. Specify the 'Screen Distribution' mode:

☐ Only Good ☐ Only Defects ☒ Both

4. Specify the minimum and maximum screen sizes:

13  18

5. Select detailed classification methods to include:

☒ COB ☒ NY

6. Select extra features:

☒ Screen Sizes Plot and Classes Distribution Plot☒ Sample images of Good and Defective Coffees☐ Correlations Plots☐ Artificial Intelligence Metrics☐ Descriptive Statistics

7. Click 'Generate PDF' to export the report:

Generate PDF

Open Pdf after Export ☒

# Classification Report

13. O relatório de classificação incorpora alterações na distribuição de peneira, permitindo que seja representado em relação ao peso ou em relação à contagem.

14. Pode-se selecionar somente café bom, somente café defeituoso, ou ambos, para geração das tabelas e gráficos do relatório.

15. O usuário pode especificar limites para o tamanho de peneira.

16. Uma nova caixa de seleção permite especificar o método a ser incluído no relatório

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## Quality Control

**Export Images**

1. Please select the image export mode:

- ☒ Export all classes (Classification results)
- ☐ Export as a single class (Dataset creation)
- ☐ Export corrected images only (Model improvement)

2. Click 'Export Images' to save individual images

Export Images

- ☒ Open folder after saving

17.

# Classification Report

13. A exportação de imagens foi dividida em três modos diferentes:

**Exportar Todas as Classes:** Salva uma nova pasta para cada classe, contendo as respectivas imagens dentro.

**Exportar como uma Única Classe:** Salva todas as imagens em uma única pasta e é destinado à criação de conjuntos de dados de treinamento, particularmente em casos onde a amostra de entrada é previamente conhecida por ser de uma única classe.

**Exportar Imagens Corrigidas:** Exporta apenas as imagens cuja classes foram alteradas pelo usuário.



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