



FRAG3281

RECIPE - FLOATING ROSETTE CHRISTMAS TREE IN HPM

CANDLE SHACK

WHAT YOU WILL NEED

[1x Floating Rosette - Pillar Candle Mould](#)

[0,81g of Christmas Tree Fragrance Oil](#)

[26,19g of HPM Wax](#)

[6x TG8 Wicks](#)

THE STEP-BY-STEP PROCESS

STEP 1

Melt HPM wax at 75°C

STEP 2

Once the wax is fully melted, add your fragrance and stir it for around 1 minute until the mixture is homogeneous.

STEP 3

Slowly pour the fragrance into your mould cavities to your desired height.

STEP 4

Add the tealight wick to the centre of each cavity.

STEP 5

When your candles have fully set, which is usually after about 2 hours, gently pop them out of the mould.

STEP 6

Leave your candles to cure at room temperature for 48 hours.

STEP 7

Trim the wick to 5mm before lighting.

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Candle Shack Ltd, Unit A, West Carron Works,
Stenhouse Road, Carron, Stirlingshire, FK2 8DR

Technical report on a test set of candles made in Candle Shack R&D department for
sooting behaviour testing and fire safety testing

Date of Report: 04/10/23

Testing Period: 04/10/2023 - 04/10/2023

Sample Ref	PIL0009J-2	No. of Samples	3
Candle Name	27g Flower-shaped Floating Candle, 3% in HPM		
Description	27g Mineral Blend Wax Fragranced Candle		
Fragrance	Christmas Tree	Weight per candle	0.81g
Wax	HPM Wax	Weight per candle	26.19g
Colour	White	Height	25mm
Wick Type	TG8	Width	40mm
Wick Positioning	Centred	Depth	40mm
Surface Defects	None		

TECHNICAL REPORT

Part 1: SPECIFICATION FOR SOOTING BEHAVIOUR

To evaluate the performance of a test set of candles in a controlled environment against the requirements of BS EN 15426:2018 (Candles. Specification for sooting behaviour)

Part 2: SPECIFICATION FOR FIRE SAFETY

To evaluate the performance of a test set of candles in a controlled environment against the requirements of BS EN 15493:2019 (Candles. Specification for fire safety)



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Part 1: SPECIFICATION FOR SOOTING BEHAVIOUR

Requirement

When tested in accordance with clause 9 of EN 15426:2018, the average soot index per hour from three tests (samples) shall be less than 1.0/h

The room temperature during testing was 20±5°C

Wicks were trimmed to 5mm before lighting.

Cycles: 240 ± 5 min cycles with >60min pause between cycles)

Soot testing was performed in wire mesh cylinder Type 1 (Diameter: 230 ± 10 mm)

Sample Ref.	Total burn time t_m (h)	Hourly soot index Si_h	Average soot index per hour Si_h	Result
PIL0009J-2.1	4.00	0.00	0.02	PASS
PIL0009J-2.2	4.00	0.00		
PIL0009J-2.3	4.00	0.06		



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Part 2: SPECIFICATION FOR FIRE SAFETY

Test Property	Test Method	Test Requirements	Result
Stability	EN 15493:2019 4.1 (Visual Check)	Candle should not tip over when placed on a 10° incline plane	PASS
Secondary Ignition	EN 15493:2019 4.2 (Visual Check)	No secondary ignition shall occur for more than 10 s	PASS
Flame Height	EN 15493:2019 4.3 (Measurement)	The flame height for all candle types, except for tea lights, shall not exceed 75mm. The flame height for tea lights shall not exceed 30mm	PASS Maximum: 20 mm
Behaviour after extinguishing	EN 15493:2019 4.5.1 (Visual Check)	After extinguishing the candle shall not spontaneously re-light	PASS
	EN 15493:2019 4.5.2 (Measurement)	The wick shall not continue to glow or smoke for an average time of more than 30 s after extinguishing	PASS Average: 5 s
Container Candles	EN 15493:2019 4.6 (Visual Check)	The container shall not crack or break at any time throughout the burning test	PASS

The room temperature during testing was 20±5°C
Wicks were trimmed to 5mm before lighting.

Candle Performance (240 ± 5 min cycles with >60min pause between cycles)

Sample Ref.	Gross Weight (g)	Total Wax Consumed (g)	*Total Burning Time (h)	Wax Consumption Rate (g/h)
PIL0009J-2.1	27.1	22.8	4.0	5.70
PIL0009J-2.2	26.9	16.0	4.0	4.00
PIL0009J-2.3	27.1	20.0	4.0	5.00

*If a candle self-extinguishes during the final burn cycle, the time of self-extinguishing is estimated.

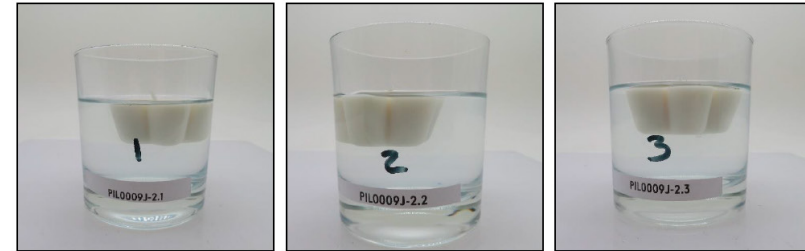
Notes and Discussion:

Soot test only burned for 4 hours. Candles were not re-lit.



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IMAGE GALLERY



End of Burn Front - Sample 1

End of Burn Front - Sample 2

End of Burn Front - Sample 3



End of Burn Top - Sample 1

End of Burn Top - Sample 2

End of Burn Top - Sample 3

END OF REPORT

Patrycja Krajewska

Patrycja Krajewska
Development Technologist

