



Brussels, **XXX**
[...](2018) **XXX** draft

ANNEXES 1 to 10

ANNEXES

to the

Commission Delegated Regulation

**supplementing Regulation (EU) 2017/1369
of the European Parliament and of the Council with regard to
energy labelling of household washing machines and household washer-dryers**

**and repealing Commission Delegated Regulation (EU) No 1061/2010
and Commission Directive 96/60/EC**

ANNEX I

Definitions applicable for the annexes

For the purposes of the annexes, the following definitions shall apply:

- (1) 'washing cycle' means a complete washing process as defined by the required programme, consisting of a series of different operations including washing, rinsing, and spinning;
- (2) 'drying cycle' means a complete drying process as defined by the required programme, consisting of a series of different operations including heating and spinning;
- (3) 'complete cycle' means a washing and drying process, consisting of a washing cycle and a drying cycle;
- (4) 'continuous cycle' means a complete cycle without interruption of the process and with no need for user intervention at any point during the programme;
- (5) 'rated capacity' means the maximum mass in kilograms stated by the manufacturer at 0,5 kg intervals of dry textiles of a particular type, which can be treated in one washing cycle of a household washing machine, or in one complete cycle of a household washer-dryer respectively, on the selected programme;
- (6) 'rated washing capacity' means the maximum mass in kilograms stated by the manufacturer at 0,5 kg intervals of dry textiles of a particular type, which can be washed in one washing cycle of a household washing machine, or in one washing cycle of a washer-dryer respectively, on the selected programme;
- (7) 'rated drying capacity' means the maximum mass in kilograms stated by the manufacturer at 0,5 kg intervals of dry textiles of a particular type, which can be dried in one drying cycle of a household washer-dryer on the selected programme;
- (8) 'remaining moisture content' means for household washing machines and for the washing cycle of washer-dryers, the amount of moisture contained in the load at the end of the spinning phase;
- (9) 'final moisture content' means for household washer-dryers the amount of moisture contained in the load at the end of the drying phase;
- (10) 'programme duration' means the length of time beginning with the initiation of the programme selected, excluding any user programmed delay, until an end of programme indicator is activated and the user has access to the load;
- (11) 'off-mode' means a condition in which the equipment is connected to the mains power source and is not providing any function; the following shall also be considered as off mode:
 - (a) a condition providing only an indication of off-mode;
 - (b) a condition providing only functionalities intended to ensure electromagnetic compatibility pursuant to Directive 2014/30/EU¹;

¹ Directive 2014/30/EU of the European Parliament and of the Council of 26 February 2014 on the harmonisation of the laws of the Member States relating to electromagnetic compatibility (OJ L 96, 29.3.2014, p. 79).

- (12) 'standby mode' means a condition where the equipment is connected to the mains power source and provides only the following functions, which may persist for an indefinite time:
- (a) reactivation function, possibly through network connection, or reactivation function and only an indication of enabled reaction function, and/or
 - (b) information or status display, and/or
 - (c) detection function for emergency measures;
- (13) 'delay start' means a condition in which the equipment automatically starts its main function at a later time as programmed by the user;
- (14) 'display mechanism' means any screen, including tactile screen, or other visual technology used for displaying internet content to users;
- (15) 'nested display' means visual interface where an image or data set is accessed by a mouse click, mouse roll-over or tactile screen expansion of another image or data set;
- (16) 'tactile screen' means a screen responding to touch, such as that of a tablet computer, slate computer or a smartphone;
- (17) 'alternative text' means text provided as an alternative to a graphic allowing information to be presented in non- graphical form where display devices cannot render the graphic or as an aid to accessibility such as input to voice synthesis applications.

ANNEX II

A. Energy efficiency classes

The energy efficiency class of a household washing machine and of the washing cycle of a household washer-dryer shall be determined on the basis of its Energy Efficiency Index (EEI) as set out in Table 1.

The EEI of a household washing machine and of the washing cycle of a household washer-dryer shall be calculated in accordance with Annex III.

Table 1
Energy efficiency classes of household washing machines and of the washing cycle of household washer-dryers

Energy Efficiency Class	Energy Efficiency Index (EEI)
A (most efficient)	$EEI \leq 52$
B	$52 < EEI \leq 60$
C	$60 < EEI \leq 69$
D	$69 < EEI \leq 80$
E	$80 < EEI \leq 91$
F	$91 < EEI \leq 105$
G (least efficient)	$EEI > 105$

The energy efficiency class of the complete cycle of a household washer-dryer shall be determined on the basis of its Energy Efficiency Index (C) as set out in Table 2.

The C of the complete cycle of a household washer-dryer shall be calculated in accordance with Annex III.

Table 2
Energy efficiency classes of the complete cycle of a household washer-dryer

Energy Efficiency Class	Energy Efficiency Index (C)
A	$C \leq 37$
B	$37 < C \leq 48$
C	$48 < C \leq 63$
D	$63 < C \leq 76$
E	$76 < C \leq 88$
F	$88 < C \leq 100$
G	$C > 100$

B. Spin-drying efficiency classes

The spin-drying efficiency class of a household washing machine and of the washing cycle of a household washer-dryer shall be determined on the basis of the remaining moisture content (D) as set out in Table 3.

The D of a household washing machine and of the washing cycle of a household washer-dryer shall be calculated in accordance with Annex III.

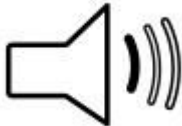


Table 3
Spin-drying efficiency classes

Spin-drying efficiency class	Remaining moisture content (D) (%)
A (most efficient)	$D < 45$
B	$45 \leq D < 54$
C	$54 \leq D < 63$
D	$63 \leq D < 72$
E	$72 \leq D < 81$
F	$81 \leq D < 90$
G (least efficient)	$D \geq 90$

C. Acoustic airborne noise emission classes

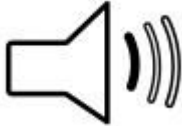

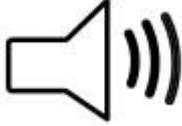
The acoustic airborne noise emission class of a household washing machine and of the washing cycle of a household washer-dryer shall be determined on the basis of the acoustic airborne noise emissions as set out in Table 4.

Table 4
Acoustic airborne noise emission classes

Phase	Acoustic airborne noise emission class	Icon on the label	Noise (dB)
Washing	A	-	$n < 51$
	B	-	$51 \leq n < 57$
	C	-	$n \geq 57$
Spinning	A		$n < 74$
	B		$74 \leq n < 77$
	C		$n \geq 77$

The acoustic airborne noise emission class of a household washer-dryer shall be determined on the basis of the acoustic airborne noise emissions as set out in Table 5.

Table 5
Acoustic airborne noise emission classes for washer-dryers

Phase	Acoustic airborne noise emission class	Icon on the label	Noise (dB)
Drying	A		$n < 59$
	B		$59 \leq n < 64$
	C		$n \geq 64$

ANNEX III

Measurement and calculation methods

For the purposes of compliance and verification of compliance with the requirements of this Regulation, measurements and calculations shall be made using harmonised standards the reference numbers of which have been published for this purpose in the *Official Journal of the European Union*, or other reliable, accurate and reproducible methods, which takes into account the generally recognised state-of-the-art, and in line with the following provisions.

Numbers shall be rounded in accordance with B.3 Rule B of ISO 80000-1:2009. If the rounding takes place in decimals, the omitted places shall not be filled with zeros.

1. RATED CAPACITY OF WASHER-DRYERS

The rated capacity of washer-dryers shall be measured, using the ‘wash and dry’ complete programme.

If the household washer-dryer provides continuous complete cycles, the rated capacity of the washer-dryer shall be the maximum capacity for this complete cycle.

If the household washer-dryer does not provide continuous complete cycles, the rated capacity of the washer-dryer shall be the lowest value between the maximum capacity of the ‘eco 40-60’ washing cycle (i.e. the rated washing capacity) and the maximum capacity of the drying cycle achieving ‘cupboard dry’ status (i.e. the rated drying capacity).

2. ENERGY EFFICIENCY INDEX

2.1. *Energy Efficiency Index (EEI) of household washing machines and the washing cycle of household washer-dryers*

For the calculation of the EEI, the weighted energy consumption of the ‘eco 40-60’ programme at full, half and quarter loads is compared to its standard energy consumption.

- (a) The EEI is calculated as follows, and is rounded to one decimal place:

$$EEI = (E_t / SCE_C) \times 100$$

where:

E_t is the weighted cycle energy consumption of the household washing machine or the washing cycle of the household washer-dryer;

SCE_C is the standard cycle energy consumption of the household washing machine or the washing cycle of the household washer-dryer.

- (b) The SCE_C is calculated in kWh per cycle and rounded to three decimal places as follows:

$$SCE_C = -0,0025 \times c^2 + 0,0846 \times c + 0,3920$$

where c is the rated capacity of the household washing machine or the rated washing capacity of the washer-dryer for the eco 40-60 programme.

- (c) The E_t is calculated in kWh per cycle as follows and rounded to three decimal places:

$$E_t = A \times E_{t,full} + B \times E_{t,\frac{1}{2}} + C \times E_{t,\frac{1}{4}}$$

where:

$E_{t,full}$ is the energy consumption of the 'eco 40-60' programme at full rated washing capacity and rounded to three decimal places;

$E_{t,1/2}$ is the energy consumption of the 'eco 40-60' programme at half of the rated washing capacity and rounded to three decimal places;

$E_{t,1/4}$ is the energy consumption of the 'eco 40-60' programme at a quarter of the rated washing capacity and rounded to three decimal places;

A is the weighting factor for the full rated washing capacity;

B is the weighting factor for half of the rated washing capacity;

C is the weighting factor for a quarter of the rated washing capacity.

The values of the weighting factors depend on the rated capacity according to the following equations:

$$A = -0,0391 \times c + 0,6918$$

$$B = -0,0109 \times c + 0,3582$$

$$C = 1 - (A + B)$$

where:

c is the rated capacity of the washing machine or the washing rated capacity of the washer dryer.

2.2. *Energy Efficiency Index of the complete cycle of household washer-dryers*

For the calculation of the Energy Efficiency Index (C) of a household washer-dryer model, the weighted energy consumption of the 'wash and dry' programme at full and half loads is compared to its standard cycle energy consumption.

- (a) The C is calculated as follows, and is rounded to one decimal place:

$$C = (E_d / S_C) \times 100$$

where:

E_d = weighted cycle energy consumption of the household washer-dryer;

S_C = standard cycle energy consumption of the household washer-dryer.

- (b) The S_C is calculated in kWh per cycle and rounded to three decimal places as follows:

$$S_C = -0,0502 \times d^2 + 1,1742 \times d - 0,644$$

where d is the rated capacity of the household washer-dryer for the 'wash and dry' programme.

- (c) The weighted energy consumption (E_d) is calculated in kWh per cycle as follows and rounded to three decimal places:

$$E_d = \frac{[3 \times E_{d,full} + 2 \times E_{d,1/2}]}{5}$$

where:

$E_{d,full}$ is the energy consumption of the 'wash and dry' programme at full load, i.e. at rated capacity and rounded to three decimal places;

$E_{d,1/2}$ is the energy consumption of the ‘wash and dry’ programme at half load, i.e. at half the rated capacity and rounded to three decimal places.

3. WEIGHTED WATER CONSUMPTION

- (1) The weighted water consumption (W_t) of a household washing machine or the washing cycle of a household washer-dryer is calculated in litres and rounded to the nearest integer:

$$W_t = (A \times W_{t,full} + B \times W_{t,1/2} + C \times W_{t,1/4})$$

where:

$W_{t,full}$ is the water consumption of the ‘eco 40-60’ programme at rated washing capacity, in litres and rounded to one decimal place;

$W_{t,1/2}$ is the water consumption of the ‘eco 40-60’ programme at half of the rated washing capacity, in litres and rounded to one decimal place;

$W_{t,1/4}$ is the water consumption of the ‘eco 40-60’ programme at a quarter of the rated washing capacity, in litres and rounded to one decimal place;

A, B and C are the weighting factors as described in point 2.1.(c).

- (2) The weighted water consumption (W_d) of the ‘wash and dry’ programme of a household washer-dryer is calculated as follows and rounded to the nearest integer:

$$W_d = \frac{[3 \times W_{d,full} + 2 \times W_{d,1/2}]}{5}$$

where:

$W_{d,full}$ is the water consumption of the ‘wash and dry’ programme of a household washer-dryer at rated capacity, in litres and rounded to one decimal place;

$W_{d,1/2}$ is the water consumption of the ‘wash and dry’ programme of a household washer-dryer at half of the rated capacity, in litres and rounded to one decimal place.

4. REMAINING MOISTURE CONTENT

The weighted remaining moisture content after washing (D) of a household washing machine and the washing cycle of a household washer-dryer is calculated in percentage as follows and rounded to the nearest whole percent:

$$D = \left[A \times D_{t,full} + B \times D_{t,1/2} + C \times D_{t,1/4} \right]$$

where:

$D_{t,full}$ is the remaining moisture content for the ‘eco 40-60’ programme at rated washing capacity, in percentage and rounded to the nearest whole per cent;

$D_{t,1/2}$ is the remaining moisture content for the ‘eco 40-60’ programme at half of the rated washing capacity in percentage and rounded to the nearest whole per cent;

$D_{t,1/4}$ is the remaining moisture content for the ‘eco 40-60’ programme at a quarter of the rated washing capacity in percentage and rounded to the nearest whole per cent;

A, B and C are the weighting factors as described in point 2.1.(c).

5. ACOUSTIC AIRBORNE NOISE EMISSION

The acoustic airborne noise emission of the washing phase and spinning phase of household washing machines and household washer-dryers shall be calculated for the 'eco 40-60' programme at rated washing capacity, using harmonised standards the reference numbers of which have been published for this purpose in the Official Journal of the European Union, or other reliable, accurate and reproducible methods, which takes into account the generally recognised state-of-the-art, and rounded at nearest integer.

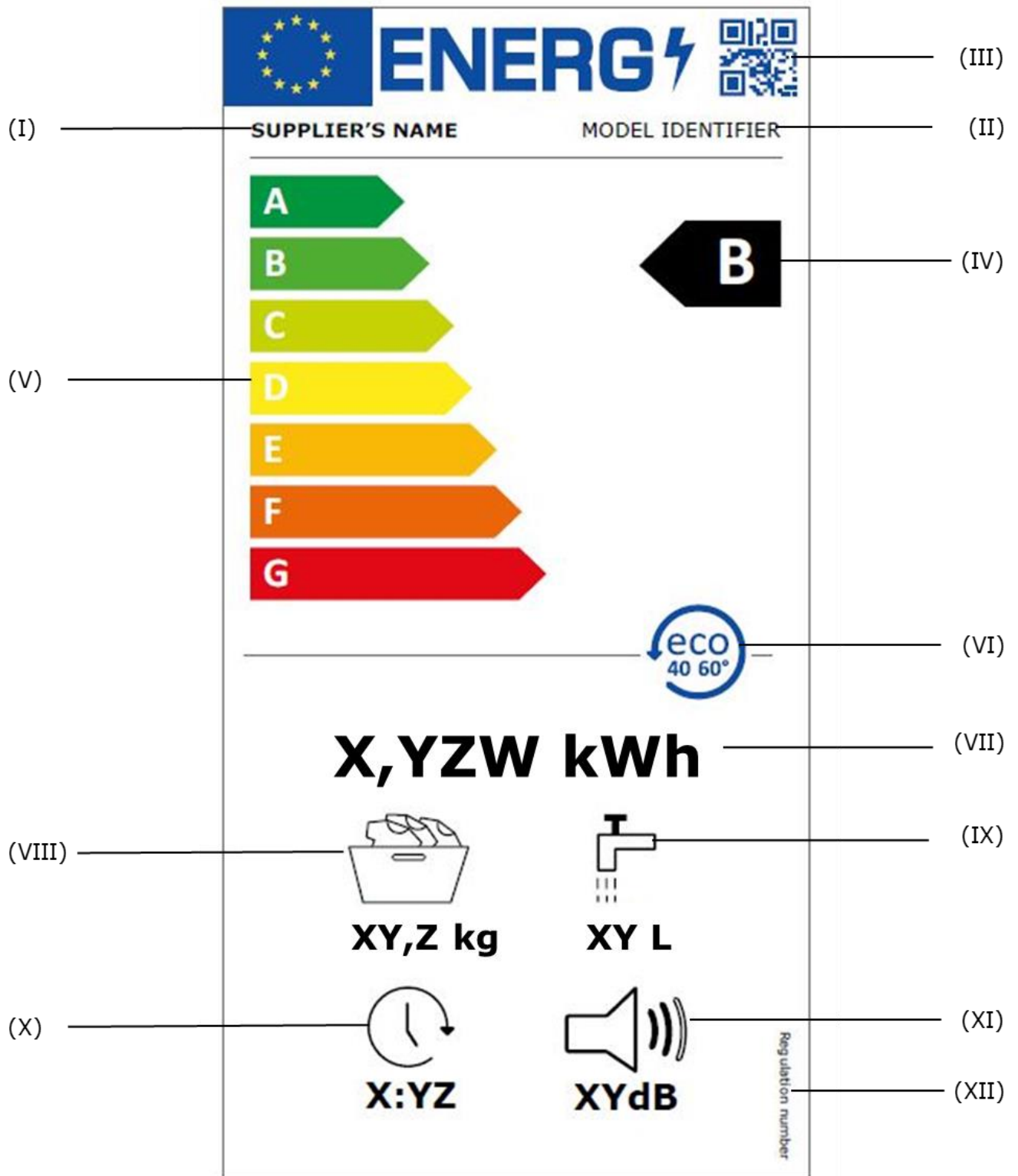
The acoustic airborne noise emission of household washer-dryers shall be calculated for the drying phase of the wash and dry cycle, using harmonised standards the reference numbers of which have been published for this purpose in the Official Journal of the European Union, or other reliable, accurate and reproducible methods, which takes into account the generally recognised state-of-the-art, and rounded at nearest integer.

ANNEX IV

A. Label for household washing machines

1. LABEL FOR HOUSEHOLD WASHING MACHINES

(1) Label

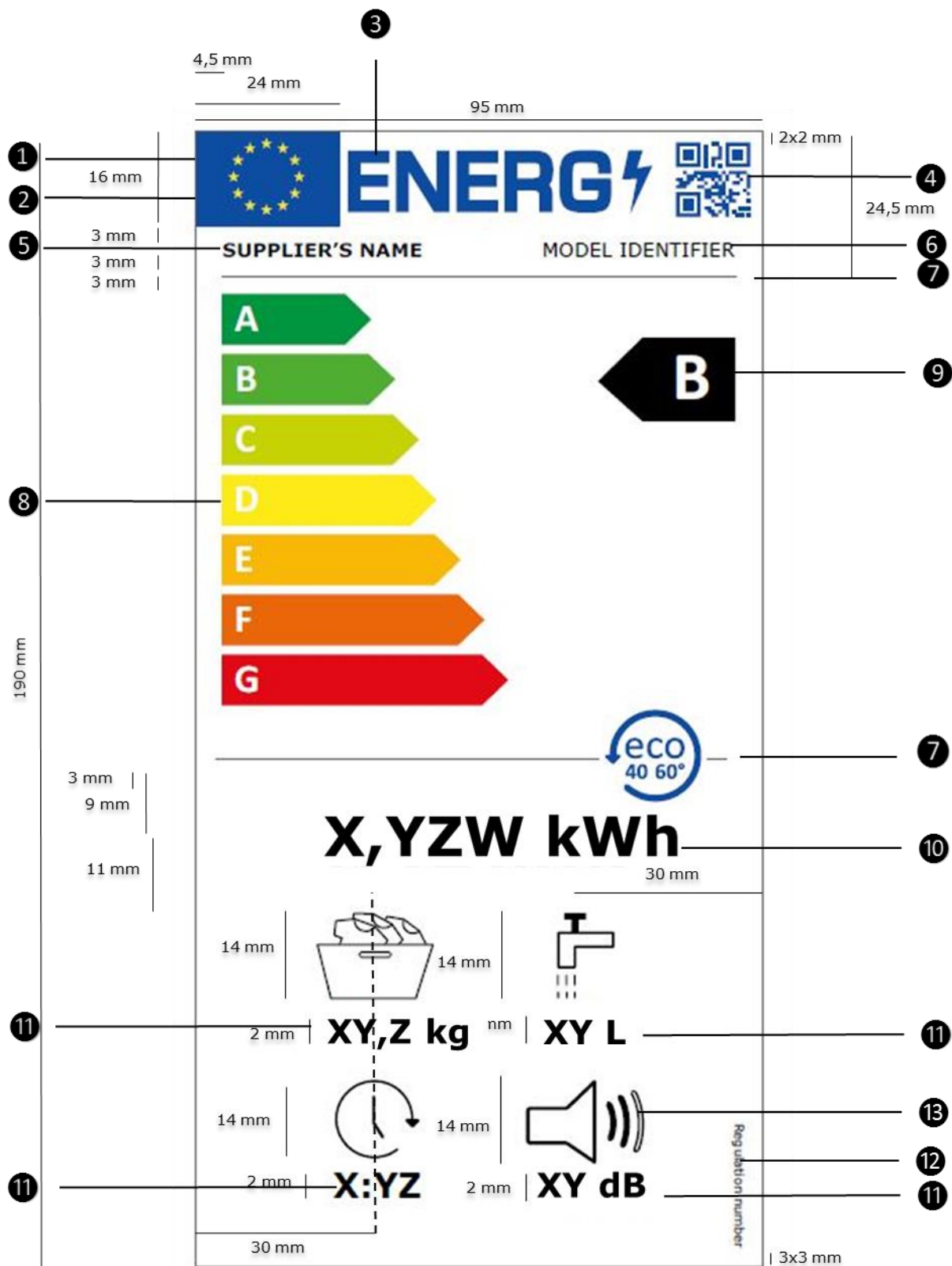


The following information shall be included in the label:

- I supplier's name or trade mark;
- II model identifier, meaning the code, usually alphanumeric, which distinguishes a specific household washing machine model from other models with the same trade mark or supplier's name;
- III QR code linking to the model information in the product database established by Article 12 of Regulation (EU) 2017/1369;
- IV the energy efficiency class determined in accordance with Annex II; the head of the arrow containing the energy efficiency class shall be placed at the same height as the head of the arrow of the relevant energy efficiency class;
- V scale of energy efficiency classes from A to G;
- VI indication of the 'eco 40-60' programme used to test the washing machine;
- VII weighted energy consumption per cycle (E_t) in kWh per cycle, rounded to three decimal places in accordance with Annex III;
- VIII rated capacity, in kg, for the 'eco 40-60' programme;
- IX weighted water consumption per cycle (W_t), in litres per cycle, rounded to the nearest integer in accordance with Annex III;
- X duration of the 'eco 40-60' programme at full load in hh:mm rounded to the nearest minute;
- XI airborne acoustic noise emissions of the spinning phase, expressed in dB(A) re 1 pW and rounded to the nearest integer, and airborne acoustic noise emission class of the spinning phase, determined in accordance with point C of Annex II;
- XII reference number of this Regulation

2. LABEL DESIGN FOR HOUSEHOLD WASHING MACHINES

The design of the label shall be as in the figure below.



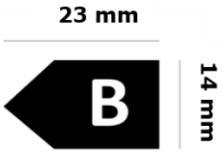
Whereby:

- (a) The background of the label shall be white;
- (b) The single typeface shall be Verdana;
- (c) Colours shall be according to the CMYK – cyan, magenta, yellow and black, colour codes following this example: 0,70,100,0: 0 % cyan, 70 % magenta, 100 % yellow, 0 % black. Black is 0,0,0,100 and white is 0,0,0,0;
- (d) The label shall fulfil all the following requirements (numbers refer to the numbers in the black bullets in the figure above):
 - (1) the border of the label shall have weight of 1 pt;
 - (2) the colour of the background of the EU logo shall be 100,80,0,0 and the colour of the stars shall be 0,0,100,0;
 - (3) the colour of the energy logo shall be 100,80,0,0;
 - (4) the colour of the QR code shall be 100,80,0,0;
 - (5) the supplier’s name shall be in colour black in font bold, 9 pt;
 - (6) the model identifier shall be in colour black in font regular, 9 pt;
 - (7) the dividers shall be 86 mm wide and have a weight of 1 pt. The colour of the divider shall be black;
 - (8) the A to G scale shall be as follows:
 - the colour of the letter indicating energy rating scale shall be white and the font bold, 19 pt;
 - dimensions and colours of the energy rating scale shall be as follows:

Rating scale and class	Colours (CMYK)
<p>The diagram shows a vertical energy rating scale with seven classes, A through G, represented by horizontal arrows pointing to the right. The arrows are colored as follows: A (green), B (light green), C (yellow-green), D (yellow), E (orange-yellow), F (orange), and G (red). The arrows increase in length from A to G. To the left of the arrows, a vertical dimension line indicates a total height of 69 mm, with 1,5 mm segments between each arrow. Above the arrows, dimensions are given for classes D, C, B, and A. Below the arrows, dimensions are given for classes G, F, and E.</p> <p>D: 36 mm C: 33 mm B: 29 mm A: 23 mm</p> <p>G: 48 mm F: 44 mm E: 40 mm</p>	A-class: 100,0,100,0
	B-class: 70,0,100,0
	C-class: 30,0,100,0
	D-class: 0,0,100,0
	E-class: 0,30,100,0
	F-class: 0,70,100,0
	G-class: 0,100,100,0

(9) the energy efficiency class shall be as follows:

- the rating scale arrow and the energy efficiency class arrow shall be aligned;
- dimensions and colour shall be as follows:

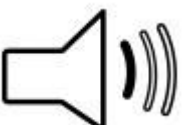

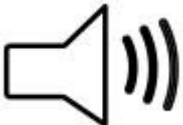
Rating scale and class	Colours (CMYK)
	<p>The arrow: 0,0,0,100 (black)</p> <p>The letter: 0,0,0,0 (white)</p> <p>The letter font: bold, 33 pt</p>

(10) the E_t and kWh shall be in colour black and font bold, 26 pt;

(11) the rated capacity, W_t , programme duration, airborne acoustic noise emissions and corresponding units shall be in colour black and font bold, 16 pt;

(12) the Regulation number shall be in colour black and font bold, 6 pt;

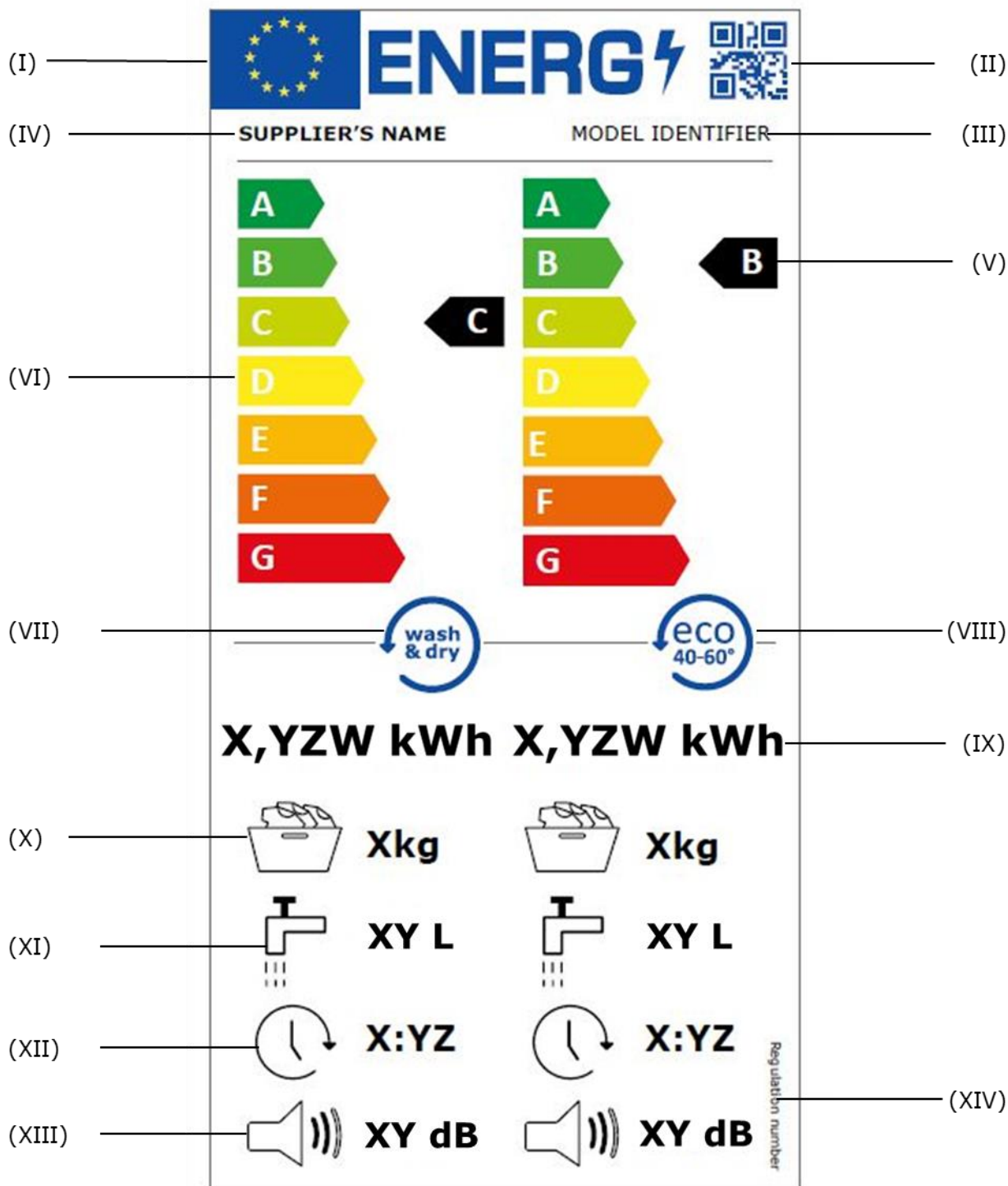
(13) the airborne acoustic noise emissions logo shall be one of the three following logos in colour black, determined in accordance with point B of Annex II:

Acoustic airborne noise emission class	A	B	C
Logo			

B. Label for household washer-dryers

1. LABEL FOR HOUSEHOLD WASHER-DRYERS

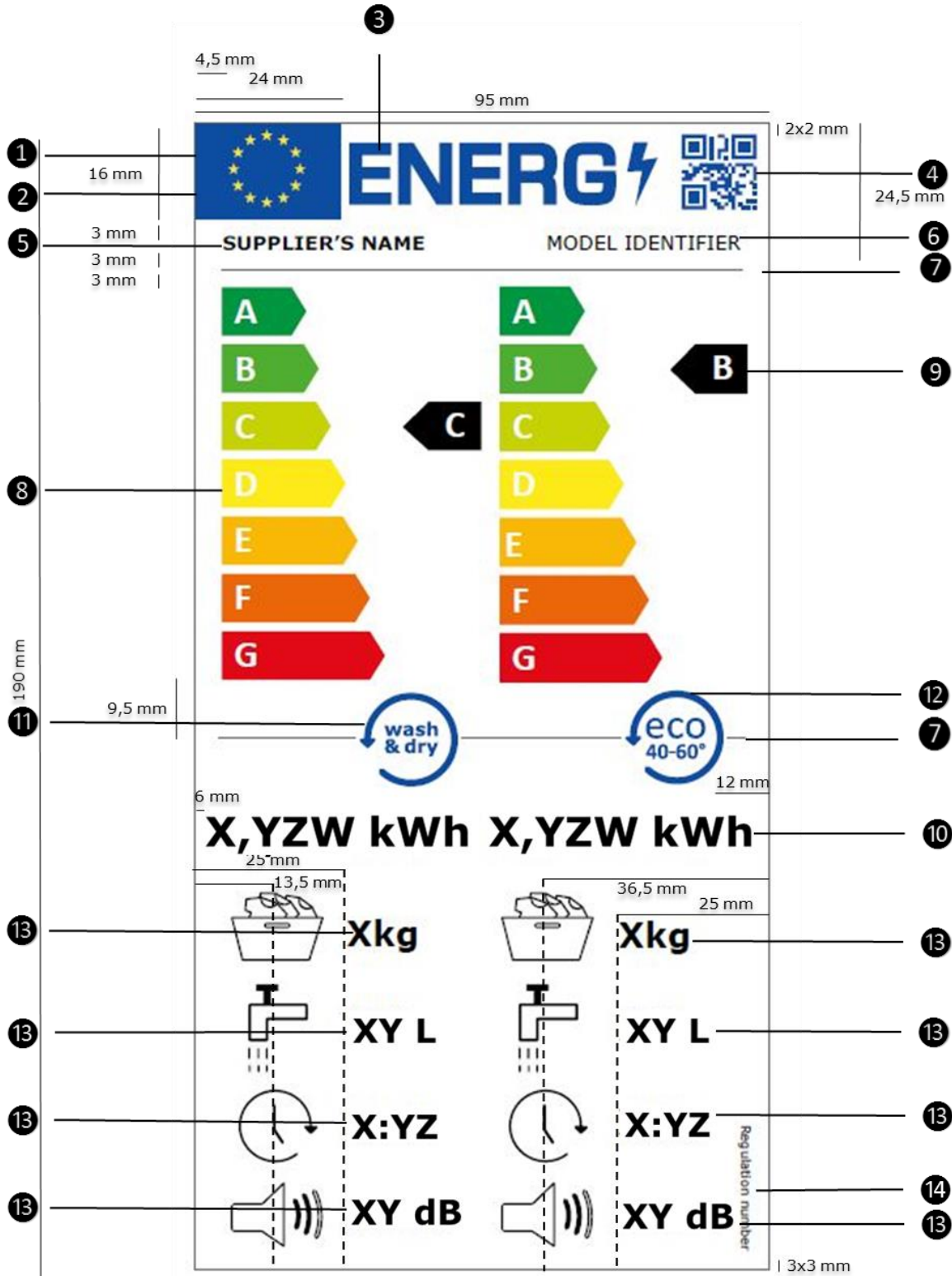
(1) Label:



The following information shall be included in the label:

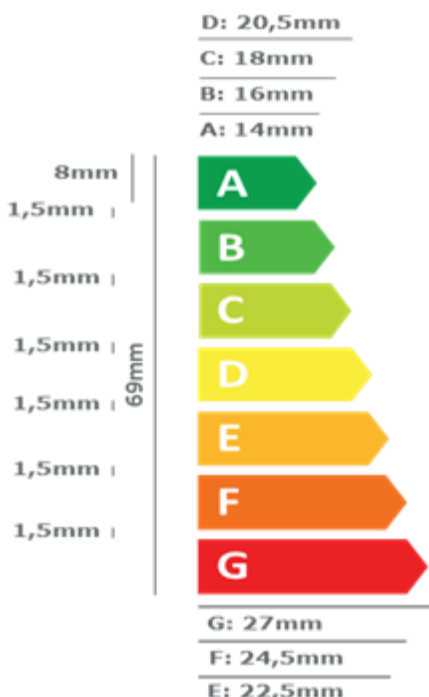
- I EU and energy logos;
- II QR code linking to the model information in the product database established by Article 12 of Regulation (EU) 2017/1369;
- III model identifier, meaning the code, usually alphanumeric, which distinguishes a specific household washer-dryer model from other models with the same trade mark or supplier's name;
- IV supplier's name or trade mark;
- V the energy efficiency class for the washing cycle (on the right side) determined in accordance with Annex II; the head of the arrow containing the energy efficiency class shall be placed at the same height as the head of the arrow of the relevant energy efficiency class;
- VI the energy efficiency class for the complete cycle (on the left side) determined in accordance with Annex II; the head of the arrow containing the energy efficiency class shall be placed at the same height as the head of the arrow of the relevant energy efficiency class;
- VII indication of the 'wash and dry' cycle used to test the complete cycle (on the left side) and
- VIII indication of the 'eco 40-60' programme used to test the washing cycle of the washer-dryer (on the right side);
- IX weighted energy consumption per cycle in kWh per cycle, rounded to three decimal places in accordance with Annex III, for the complete cycle (E_t , on the left side); and for the washing cycle (E_d , on the right side);
- X rated capacity for the complete cycle (on the left side); and for the washing cycle (on the right side);
- XI weighted water consumption per cycle (W_t), in litres per cycle, rounded to the nearest integer in accordance with Annex III, for the complete cycle (on the left side); and for the washing cycle (W_d , on the right side);
- XII duration of the test programme at full rated capacity for the complete cycle (on the left side); and at full rated washing capacity for the washing cycle (on the right side);
- XIII airborne acoustic noise emission class of the drying phase of the 'wash and dry' cycle, with value in dB(A) re 1 pW and rounded to the nearest integer (on the left side); and airborne acoustic noise emission class of the spinning phase of the 'eco 40-60' programme, with value in dB(A) re 1 pW and rounded to the nearest integer (on the right side);
- XIV reference number of this Regulation.

2. LABEL DESIGN FOR HOUSEHOLD WASHER-DRYERS

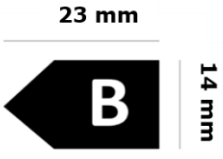


Whereby:

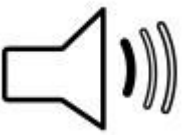

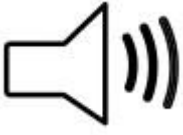
- (a) The background of the label shall be white;
- (b) The single typeface shall be Verdana;
- (c) Colours shall be according to the CMYK – cyan, magenta, yellow and black, colour codes following this example: 0,70,100,0: 0 % cyan, 70 % magenta, 100 % yellow, 0 % black. Black is 0,0,0,100 and white is 0,0,0,0;
- (d) The label shall fulfil all the following requirements (numbers refer to the numbers in the black bullets in the figure above):
 - (1) the border of the label shall have weight of 1 pt;
 - (2) the colour of the background of the EU logo shall be 100,80,0,0 and the colour of the stars shall be 0,0,100,0;
 - (3) the colour of the energy logo shall be 100,80,0,0;
 - (4) the colour of the QR code shall be 100,80,0,0;
 - (5) the supplier’s name shall be in colour black in font bold, 9 pt;
 - (6) the model identifier shall be in colour black in font regular, 9 pt;
 - (7) the dividers shall be 86 mm wide and have a weight of 1 pt. The colour of the divider shall be black;
 - (8) the A to G scales shall be as follows:
 - the colour of the letter indicating energy rating scale shall be white and the font bold, 19 pt;
 - dimensions and colours of the energy rating scale shall be as follows:

Rating scale and class	Colours (CMYK)
	A-class: 100,0,100,0
	B-class: 70,0,100,0
	C-class: 30,0,100,0
	D-class: 0,0,100,0
	E-class: 0,30,100,0
	F-class: 0,70,100,0
	G-class: 0,100,100,0

- (9) Each of the energy efficiency classes (C and EEI) shall be as follows:
- the rating scale arrow and the energy efficiency class arrow shall be aligned;
 - dimensions and colour shall be as follows:

Rating scale and class	Colours (CMYK)
	<p>The arrow: 0,0,0,100 (black)</p> <p>The letter: 0,0,0,0 (white)</p> <p>The letter font: bold, 33 pt</p>

- (10) the E_t , E_d and kWh shall be in colour black and font bold, 26 pt;
- (11) the wash & dry indicator shall be as follows:
- the colour shall be 100,80,0,0;
 - the circular arrows shall 16 mm large on 15,3 mm high;
 - the letters ‘wash & dry’ shall be Verdana bold, 9 pt;
- (12) the eco 40-60 programme indicator shall be as follows:
- the colour shall be 100,80,0,0;
 - the circular arrows shall 16 mm large on 15,3 mm high;
 - the letters ‘eco’ shall be in Verdana bold, 13 pt;
 - the figures ‘40-60’ shall be in Verdana bold, 8 pt;
- (13) the rated capacities, W_t and W_d , programme durations, airborne acoustic noise emissions and corresponding units shall be in colour black and font bold, 16 pt; Each of the airborne acoustic noise emissions logos shall be one of the three following logos in colour black, determined in accordance with point B of Annex II:

Acoustic airborne noise emission class	A	B	C
Logo			

- (14) the Regulation number shall be in colour black and font bold, 6 pt.

ANNEX V
Product information sheet

1. The information in the product information sheet of household washing machines shall include the following:
 - (a) supplier's name or trade mark;
 - (b) supplier's model identifier, meaning the code, usually alphanumeric, which distinguishes a specific household washing machine or household washer-dryer model from other models with the same trade mark or supplier's name;
 - (c) indication that the 'eco 40-60' programme is the washing programme to which the information on the label and the product information sheet relates, that this programme is suitable to clean normally soiled cotton laundry declared to be washable at 40 °C or 60 °C, together in the same cycle;
 - (d) rated washing capacity in kg for the 'eco 40-60' programme;
 - (e) energy efficiency class determined in accordance with Annex II;
 - (f) weighted energy consumption (E_t) per cycle in kWh per cycle, rounded to three decimal places; it shall be described as: 'Energy consumption "X,YZW" kWh per cycle, for the 'eco 40-60' programme at a combination of full and partial loads. Actual energy consumption will depend on how the appliance is used';
 - (g) the programme duration of the 'eco 40-60' programme at full, half and quarter loads in hours:minutes and rounded to the nearest minute;
 - (h) weighted water consumption (W_t) in litres per cycle, rounded to the nearest integer; it shall be described as: 'Water consumption "XY" litres per cycle, for the 'eco 40-60' programme at a combination of full and partial loads. Actual water consumption will depend on how the appliance is used and on the hardness of the water';
 - (i) maximum temperature reached for minimum 5 minutes inside the laundry during the 'eco 40-60' programme at full, half and quarter loads, in °C and rounded to the nearest integer;
 - (j) spin-drying efficiency class determined in accordance with Annex II, expressed as 'spin-drying efficiency class "X" on a scale from G (least efficient) to A (most efficient)'; this may be expressed by other means provided it is clear that the scale is from G (least efficient) to A (most efficient);
 - (k) maximum spin speed attained for the 'eco 40-60' programme at full, half or quarter loads, whichever is the lower;
 - (l) remaining moisture content after washing for the 'eco 40-60' programme at full, half or quarter loads, whichever is the greater;
 - (m) airborne acoustical noise emissions expressed in dB(A) re 1 pW and rounded to the nearest integer during the washing and spinning phases for the 'eco 40-60' programme at rated washing capacity;
 - (n) airborne acoustical noise emissions class for the washing and spinning phases for the 'eco 40-60' programme at rated washing capacity in accordance with Annex II;
 - (o) an indication, whether the household washing machine is intended to be installed as free-standing or built-in;

- (p) the date (day, month, year) of most recent update of the information;
 - (q) the date (month, year) when the first product of the model was placed on the EU market;
 - (r) the date (month, year) when the last product of the model was placed on the EU market (where relevant);
 - (s) time period during which the spare parts necessary for the use of the household washing machine are available.
2. The information in the product information sheet of household washer-dryers shall include the following:
- (a) supplier's name or trade mark;
 - (b) supplier's model identifier, meaning the code, usually alphanumeric, which distinguishes a specific household washing machine or household washer-dryer model from other models with the same trade mark or supplier's name;
 - (c) indication that the 'wash and dry' programme is the complete washing and drying cycle to which the information on the label and the product information sheet relates, that this programme is a combination of the 'eco 40-60' programme for the washing cycle and a drying cycle drying the laundry to 'cupboard dry' status;
 - (d) rated washing capacity in kg for the washing cycle and rated capacity of the washer-dryer for the 'wash and dry' programme;
 - (e) energy efficiency classes of the washing cycle and of the complete cycle determined in accordance with Annex III;
 - (f) weighted energy consumption (E_t) per cycle in kWh per kg, rounded to three decimal places, for the washing cycle of the washer-dryer; it shall be described as: 'Energy consumption "X,YZW" kWh per kg per cycle, for the washing cycle of the washer-dryer, using the 'eco 40-60' programme at a combination of full and partial loads. Actual energy consumption will depend on how the appliance is used';
 - (g) weighted energy consumption (E_d) per cycle in kWh per kg, rounded to three decimal places, for the complete cycle of the washer-dryer; it shall be described as: 'Energy consumption "X,YZW" kWh per kg per cycle, for the complete washing and drying cycle of the washer-dryer, using the 'wash and dry' programme at a combination of full and half loads. Actual energy consumption will depend on how the appliance is used';
 - (h) the duration of the 'eco 40-60' washing cycle at full, half and quarter loads in hours:minutes and rounded to the nearest minute;
 - (i) the duration of the 'wash and dry' cycle at full and half loads in hours:minutes and rounded to the nearest minute;
 - (j) weighted water consumption (W_t) in litres per cycle, rounded to the nearest integer, for the 'eco 40-60' washing cycle; it shall be described as: 'Water consumption "XY" litres per cycle, for the 'eco 40-60' programme at a combination of full and partial loads. Actual water consumption will depend on how the appliance is used and on the hardness of the water';

- (k) weighted water consumption (W_d) in litres per cycle, rounded to the nearest integer, for the 'wash and dry' programme; it shall be described as: 'Water consumption "XY" litres per cycle, for the complete washing and drying cycle of the washer-dryer at a combination of full and half loads. Actual water consumption will depend on how the appliance is used and on the hardness of the water';
- (l) maximum temperature reached for minimum 5 minutes inside the laundry during the 'eco 40-60' programme at full, half and quarter loads, in °C and rounded to the nearest integer;
- (m) spin-drying efficiency class of the washing cycle determined in accordance with Annex II, expressed as 'spin-drying efficiency class "X" on a scale from G (least efficient) to A (most efficient)'; this may be expressed by other means provided it is clear that the scale is from G (least efficient) to A (most efficient);
- (n) maximum spin speed attained for the 'eco 40-60' washing cycle at full, half or quarter loads, whichever is the lower;
- (o) remaining moisture content after washing for the 'eco 40-60' washing cycle at full, half or quarter loads, whichever is the greater;
- (p) airborne acoustic noise emissions expressed in dB(A) re 1 pW and rounded to the nearest integer during the washing and spinning phases for the 'eco 40-60' washing cycle at full rated washing capacity;
- (q) airborne acoustic noise emissions expressed in dB(A) re 1 pW and rounded to the nearest integer during the drying phase for the 'wash and dry' cycle at rated capacity;
- (r) airborne acoustical noise emissions class for the washing and spinning phases for the 'eco 40-60' programme at rated washing capacity in accordance with Annex II;
- (s) airborne acoustical noise emissions class for drying phase for the 'wash and dry' cycle at rated capacity in accordance with Annex II;
- (t) an indication, whether the household washer-dryer is intended to be installed as free-standing or built-in;
- (u) the date (day, month, year) of most recent update of the information;
- (v) the date (month, year) when the first product of the model was placed on the EU market;
- (w) the date (month, year) when the last product of the model was placed on the EU market (where relevant);
- (x) time period during which the spare parts necessary for the use of the household dishwasher are available.

ANNEX VI
Technical documentation

1. For a washing machine, the technical documentation referred to in Article 3(1)(d) shall include:
 - (a) identification and signature of the person empowered to bind the supplier;
 - (b) information as set out in point 1 of Annex V;
 - (c) information as set out in Table 6;

Table 6
Information to be included in the technical documentation for washing machines

PARAMETER	UNIT	VALUE
Rated capacity for the Eco 40-60 programme, at 0,5 kg intervals (c)	kg	X,X
Energy consumption of the Eco 40-60 programme at full load ($E_{t,full}$)	kWh/cycle	X,XXX
Energy consumption of the Eco 40-60 programme at half load ($E_{t,1/2}$)	kWh/cycle	X,XXX
Energy consumption of the Eco 40-60 programme at quarter load ($E_{t,1/4}$)	kWh/cycle	X,XXX
Weighted energy consumption of the Eco 40-60 programme (E_t)	kWh/cycle	X,XX
Standard energy consumption of the Eco 40-60 programme (SCE_C)	kWh/cycle	X,XX
Energy Efficiency Index (EEI)	-	XX,X
Water consumption of the Eco 40-60 programme at full load ($W_{t,full}$)	L/cycle	X,X
Water consumption of the Eco 40-60 programme at half load ($W_{t,1/2}$)	L/cycle	X,X
Water consumption of the Eco 40-60 programme at quarter load ($W_{t,1/4}$)	L/cycle	X,X
Weighted water consumption (W_t)	L/cycle	X,X
Washing efficiency index of the Eco 40-60 programme at full load (I_w)	-	X,XX
Washing efficiency index of the Eco 40-60 programme at half load (I_w)	-	X,XX
Washing efficiency index of the Eco 40-60	-	X,XX

programme at quarter load (I_w)		
Rinsing efficiency of the Eco 40-60 programme at full load (I_R)	mg/g	X,X
Rinsing efficiency of the Eco 40-60 programme at half load (I_R)	mg/g	X,X
Rinsing efficiency of the Eco 40-60 programme at quarter load (I_R)	mg/g	X,X
Programme duration of the Eco 40-60 programme at full load (t_w)	h:min	X:XX
Programme duration of the Eco 40-60 programme at half load (t_w)	h:min	X:XX
Programme duration of the Eco 40-60 programme at quarter load (t_w)	h:min	X:XX
Temperature reached for minimum 5 min inside the load during eco 40-60 programme at full load (T)	°C	XX
Temperature reached for minimum 5 min inside the load during eco 40-60 programme at half load (T)	°C	XX
Temperature reached for minimum 5 min inside the load during eco 40-60 programme at quarter load (T)	°C	XX
Weighted remaining moisture content (D)	%	XX
Airborne acoustical noise emissions during eco 40-60 programme (washing phase)	dB(A) re 1 pW	XX
Airborne acoustical noise emissions during eco 40-60 programme (spinning phase)	dB(A) re 1 pW	XX
Power consumption in 'off-mode' (P_o)	W	X,XX
Power consumption in 'standby mode' (P_{sm})	W	X,XX
Does 'standby mode' include the display of information?	-	Yes/No
Power consumption in 'standby mode' (P_{sm}) in condition of networked standby	W	X,XX
Power consumption in 'delay start' (P_{ds})	W	X,XX

- (d) where appropriate, the references of the harmonised standards applied;
- (e) where appropriate, the other technical standards and specifications used;
- (f) the calculations and the results of calculations performed in accordance with Annex III.

2. For a washer-dryer, the technical documentation referred to in Article 3(1)(d) shall include:
- (a) identification and signature of the person empowered to bind the supplier;
 - (b) information as set out in point 2 of Annex V;
 - (c) information as set out in Table 7;

*Table 7
Information to be included in the technical documentation for washer-dryers*

PARAMETER	UNIT	VALUE
Rated capacity for the washing cycle, at 0,5 kg intervals (c)	kg	X,X
Rated capacity for the wash and dry cycle, at 0,5 kg intervals (d)	kg	X,X
Energy consumption of the Eco 40-60 programme at full rated washing capacity ($E_{t,full}$)	kWh/cycle	X,XXX
Energy consumption of the Eco 40-60 programme at half of the rated washing capacity ($E_{t,1/2}$)	kWh/cycle	X,XXX
Energy consumption of the Eco 40-60 programme at a quarter of the rated washing capacity ($E_{t,1/4}$)	kWh/cycle	X,XXX
Weighted energy consumption of the Eco 40-60 programme (E_t)	kWh/cycle	X,XX
Standard energy consumption of the Eco 40-60 programme (SCE_C)	kWh/cycle	X,XX
Energy Efficiency Index of the washing cycle (EEI)	-	XX,X
Energy consumption of the wash and dry cycle at full load ($E_{d,full}$)	kWh/cycle	X,XXX
Energy consumption of the wash and dry cycle at half load ($E_{d,1/2}$)	kWh/cycle	X,XXX
Weighted energy consumption of the wash and dry cycle (E_d)	kWh/cycle	X,XX
Standard energy consumption of the wash and dry cycle (S_C)	kWh/cycle	X,XX
Energy Efficiency Index of the wash and dry cycle (C)	-	XX,X
Water consumption of the Eco 40-60 programme at rated washing capacity ($W_{t,full}$)	L/cycle	X,X

Water consumption of the Eco 40-60 programme at half of the rated washing capacity ($W_{t,1/2}$)	L/cycle	X,X
Water consumption of the Eco 40-60 programme at a quarter of the rated washing capacity ($W_{t,1/4}$)	L/cycle	X,X
Weighted water consumption of the washing cycle (W_t)	L/cycle	X,X
Water consumption of the wash and dry cycle at full load ($W_{d,full}$)	L/cycle	X,X
Water consumption of the wash and dry cycle at half load ($W_{d,1/2}$)	L/cycle	X,X
Weighted water consumption of the wash and dry cycle (W_d)	L/cycle	X,X
Washing efficiency index of the Eco 40-60 programme at full load (I_w)	-	X,XX
Washing efficiency index of the Eco 40-60 programme at half load (I_w)	-	X,XX
Washing efficiency index of the Eco 40-60 programme at quarter load (I_w)	-	X,XX
Washing efficiency index of the wash and dry cycle at full load (J_w)	-	X,XX
Washing efficiency index of the wash and dry cycle at half load (J_w)	-	X,XX
Rinsing efficiency of the Eco 40-60 programme at full load (I_R)	mg/g	X,X
Rinsing efficiency of the Eco 40-60 programme at half load (I_R)	mg/g	X,X
Rinsing efficiency of the Eco 40-60 programme at quarter load (I_R)	mg/g	X,X
Rinsing efficiency of the wash and dry cycle at full load (J_R)	mg/g	X,X
Rinsing efficiency of the wash and dry cycle at half load (J_R)	mg/g	X,X
Programme duration of the Eco 40-60 programme at full load (t_w)	h:min	X:XX
Programme duration of the Eco 40-60 programme at half load (t_w)	h:min	X:XX

Programme duration of the Eco 40-60 programme at quarter load (t_w)	h:min	X:XX
Programme duration of the wash and dry cycle at full load (t_d)	h:min	X:XX
Programme duration of the wash and dry cycle at half load (t_d)	h:min	X:XX
Temperature reached for minimum 5 min inside the load during eco 40-60 programme at full load (T)	°C	XX
Temperature reached for minimum 5 min inside the load during eco 40-60 programme at half load (T)	°C	XX
Temperature reached for minimum 5 min inside the load during eco 40-60 programme at quarter load (T)	°C	XX
Weighted remaining moisture content after washing (D)	%	XX
Final moisture content after drying	%	X,X
Airborne acoustical noise emissions during eco 40-60 programme (washing phase)	dB(A) re 1 pW	XX
Airborne acoustical noise emissions during eco 40-60 programme (spinning phase)	dB(A) re 1 pW	XX
Airborne acoustical noise emissions (drying phase of the wash and dry cycle)	dB(A) re 1 pW	XX
Power consumption in 'off-mode' (P_o)	W	X,XX
Power consumption in 'standby mode' (P_{sm})	W	X,XX
Does 'standby mode' include the display of information?	-	Yes/No
Power consumption in 'standby mode' (P_{sm}) in condition of networked standby	W	X,XX
Power consumption in 'delay start' (P_{ds})	W	X,XX

- (d) where appropriate, the references of the harmonised standards applied;
- (e) where appropriate, the other technical standards and specifications used;
- (f) the calculations and the results of calculations performed in accordance with Annex III.

3. Where the information included in the technical documentation for a particular household washing machine or household washer-dryer model has been obtained:
- from an equivalent model of the same or a different manufacturer, or
 - by calculation on the basis of design or extrapolation from another model of the same or a different manufacturer, or both,

the technical documentation shall include, as appropriate, a list of the all equivalent household washing machine or washer-dryer models, the details of such calculation, the assessment undertaken by manufacturers to verify the accuracy of the calculation and, where appropriate, the declaration of identity between the models of different manufacturers.

ANNEX VII

Information to be provided in visual advertisements, in promotional material, in distance selling except distance selling on the internet

1. In visual advertisements for washing machines, for the purposes of ensuring conformity with the requirements laid down in Article 3(1)(e) and Article 4(c), the energy class and the range of efficiency classes available on the label shall be shown with an arrow matching the letter of the energy class, as indicated in Figure 1.

In visual advertisements for washer-dryers, for the purposes of ensuring conformity with the requirements laid down in Article 3(1)(e) and Article 4(c), the energy classes of the washing cycle and of the complete cycle available on the label and the range of efficiency classes, shall be shown with two arrows matching the letters of the energy classes, as indicated in Figure 2.

2. In promotional material for washing machines, for the purposes of ensuring conformity with the requirements laid down in Article 3(1)(f) and Article 4(d), the energy class and the range of efficiency classes available on the label shall be shown with an arrow matching the letter of the energy class, as indicated in Figure 1.

In promotional material, for the purposes of ensuring conformity with the requirements laid down in Article 3(1)(f) and Article 4(d), the energy classes of the washing cycle and of the complete cycle available on the label and the range of efficiency classes, shall be shown with two arrows matching the letters of the energy classes, as indicated in Figure 2.

3. Any paper based distance selling of washing machines must show the energy class and the range of efficiency classes available on the label with an arrow matching the letter of the energy class, as indicated in Figure 1.

Any paper based distance selling of washer-dryers must show the energy classes of the washing cycle and of the complete cycle available on the label and the range of efficiency classes, with two arrows matching the letters of the energy classes, as indicated in Figure 2.

4. Telemarketing based distance selling must specifically inform the customer of the energy classes of the product and of the range of energy classes available on the label, and that they can access the full label and the product information sheet through a free access website, or by requesting a printed copy.



Figure 1: Coloured arrow example for washing machines, with range of energy classes indicated



Figure 2: Coloured arrows example for washer-dryers (complete cycle on the left side, washing cycle on the right side), with range of energy classes indicated

For all the situations mentioned in points 1 to 4, it must be possible for the customer to access the full label and the product information sheet through a link to the product database website, or to request a printed copy.

ANNEX VIII

Information to be provided in the case of distance selling through the internet

1. The appropriate label made available by suppliers in accordance with Article 3(1)(g), with the information required under Annex IV, shall be shown on the display mechanism in proximity to the price of the product. The size shall be such that the label is clearly visible and legible and shall be proportionate to the size specified in Annex IV. The label may be displayed using a nested display, in which case the image used for accessing the label shall comply with the specifications laid down in point 2 of this Annex. If nested display is applied, the label shall appear on the first mouse click, mouse roll-over or tactile screen expansion on the image.

2. The image used for accessing the label in the case of nested display shall:

- (a) be one or two arrow(s) in the colour corresponding to the energy efficiency class(es) of the product on the label;
- (b) indicate on the arrow(s) the energy efficiency class(es) of the product in white in a font size equivalent to that of the price; and
- (c) for a washing machine, have one of the following two formats:



for a washer-dryer, have one of the following formats for the complete cycle:



and one of the following formats for the washing cycle:



3. In the case of nested display, the sequence of display of the label shall be as follows:
 - (a) the images referred to in point 2 of this Annex shall be shown on the display mechanism in proximity to the price of the product;
 - (b) the images shall link to the label;
 - (c) the label shall be displayed after a mouse click, mouse roll-over or tactile screen expansion on the image;
 - (d) the label shall be displayed by pop up, new tab, new page or inset screen display;
 - (e) for magnification of the label on tactile screens, the device conventions for tactile magnification shall apply;
 - (f) the label shall cease to be displayed by means of a close option or other standard closing mechanism;
 - (g) the alternative text for the graphic, to be displayed on failure to display the label, shall be the energy efficiency classes of the product in a font size equivalent to that of the price.
4. The appropriate product information sheet made available by suppliers in accordance with Article 3(1)(h), with the information required under Annex V, shall be shown on the display mechanism in proximity to the price of the product. The size shall be

such that the product information sheet is clearly visible and legible. The product information sheet may be displayed using a nested display, in which case the link used for accessing the product information sheet shall clearly and legibly indicate 'Product information sheet'. If nested display is used, the product information sheet shall appear on the first mouse click, mouse roll-over or tactile screen expansion on the link.

ANNEX IX

Verification procedure for market surveillance purposes

The verification tolerances set out in this Annex relate only to the verification of the measured parameters by Member State authorities and shall not be used by the supplier as an allowed tolerance to establish the values in the technical documentation. The values and classes on the label or in the product fiche shall not be more favourable for the supplier than the values reported in the technical documentation.

When verifying the compliance of a product model with the requirements laid down in this Regulation, for the requirements referred to in this Annex, the authorities of the Member States shall apply the following procedure:

1. The Member State authorities shall verify one single unit of the model.
2. The model shall be considered to comply with the applicable requirements if:
 - (a) the values given in the technical documentation pursuant to Article 3(3) of Regulation (EU) 2017/1369 (declared values), and, where applicable, the values used to calculate these values, are not more favourable for the supplier than the corresponding values given in the test reports and
 - (b) the values published on the label and in the product fiche are not more favourable for the supplier than the declared values, and the indicated energy efficiency class is not more favourable for the supplier than the class determined by the declared values; and
 - (c) when the Member State authorities test the unit of the model, the determined values (the values of the relevant parameters as measured in testing and the values calculated from these measurements) comply with the respective verification tolerances as given in Table 8.
3. If the results referred to in points 2(a) or (b) are not achieved, the model and all models that have been listed as equivalent household washing machine or household washer-dryer models in the supplier's technical documentation shall be considered not to comply with this Regulation.
4. If the result referred to in point 2(c) is not achieved, the Member State authorities shall select three additional units of the same model for testing. As an alternative, the three additional units selected may be of one or more different models that have been listed as equivalent models in the supplier's technical documentation.
5. The model shall be considered to comply with the applicable requirements if for these three units, the arithmetical mean of the determined values complies with the respective tolerances given in Table 8.
6. If the result referred to in point 5 is not achieved, the model and all models that have been listed as equivalent household washing machine or household washer-dryer models in the supplier's technical documentation shall be considered not to comply with this Regulation.
7. The Member State authorities shall provide all relevant information to the authorities of the other Member States and to the Commission without delay after a decision being taken on the non-compliance of the model according to points 3 and 6.

Member States' authorities shall use measurement procedures which take into account the generally recognised, state-of-the-art, reliable, accurate and reproducible measurement

methods, including methods set out in documents whose reference numbers have been published for that purpose in the *Official Journal of the European Union*. The Member State authorities shall use the measurement and calculation methods set out in Annex III.

The Member State authorities shall only apply the verification tolerances that are set out in Table 8 and shall only use the procedure described in points 1 to 7 for the requirements referred to in this Annex. No other tolerances, such as those set out in harmonised standards or in any other measurement method, shall be applied.

Table 8 - Verification tolerances

Parameter	Verification tolerances
Weighted energy consumption (E_t and E_d)	The determined value* shall not exceed the declared value of E_t , respectively E_d , by more than 10 %.
Weighted water consumption (W_t and W_d)	The determined value* shall not exceed the declared value of W_t , respectively W_d , by more than 10 %.
Washing efficiency index (I_w and J_w)	The determined value* shall not be less than the declared value of I_w , respectively J_w , by more than 8 %.
Rinsing efficiency (I_R and J_R)	The determined value* shall not exceed the declared value of I_R , respectively J_R , by more than 1,0 mg/g.
Duration of the eco 40-60 programme (t_w)	The determined value* of the programme duration shall not exceed the declared value of t_w by more than 5 % or by more than 10 minutes, whichever is smaller.
Duration of the wash and dry cycle (t_d)	The determined value of the cycle duration shall not exceed the declared value of t_d by more than 5 %.
Temperature inside the laundry (T)	The determined value shall not be less than the declared values by more than 5K and it shall not exceed the declared value by more than 5 K.
Remaining moisture content after washing (D)	The determined value* shall not exceed the rated value of D by more than 20 %.
Final moisture content after drying	The determined value* shall not exceed 3,0 %.
Spin speed (S)	The determined value shall not be less than the rated value of S by more than 10 %.
Power consumption in off mode (P_o)	The determined value* of power consumption P_o shall not exceed the declared value by more than 0,10 W.
Power consumption in standby mode (P_{sm})	The determined value* of power consumption P_{sm} shall not exceed the declared value by more than 10 % if the declared value is higher than 1,00 W, by more than 0,10 W if the declared value is lower than or equal to 1,00 W.
Power consumption in delay start (P_{ds})	The determined value* of power consumption P_{ds} shall not exceed the declared value by more than 10 % if the declared value is higher than 1,00 W, by more than 0,10 W if the declared value is lower than or equal to 1,00 W.
Airborne acoustical noise emissions	The determined value* shall not exceed the declared value.

* In the case of three additional units tested as prescribed in point 4, the determined value means the arithmetic average of the values determined for these three additional units.

ANNEX X

Multi-drum household washing machines

For multi-drum household washing machines, the provisions of Annexes II and IV to this Regulation, following the measurement and calculation methods set out in Annex III, shall apply to any drum with a rated capacity equal to or larger than 3 kg in multi-drum household washing machines, with the exception of drums with a rated capacity smaller than 4 kg and proposing no programme for normally soiled cotton laundry and no programme with a nominal temperature above 30 °C.

Where applicable as per the previous paragraph, the provisions of Annex IV shall apply to each of the drums independently, except when the drums are built in the same casing and can only operate simultaneously in all programmes, in which case the provisions of Annex IV shall apply to the multi-drum household washing machine as a whole, as follows:

- (a) the energy and water consumption of the overall household washing machine is the total of the energy, respectively water consumption, of each drum (summing up rated capacity and considering overall energy);
- (b) the Energy Efficiency Index (EEI) is calculated considering the overall rated capacity and energy consumption;
- (c) the duration is the common duration of all programmes operating simultaneously;
- (d) the acoustic airborne noise emissions measurement and class apply to the whole washing machine.

The product information sheet and the technical documentation shall include and present jointly the information required under Annex V and Annex VI respectively, for all the drums to which the provisions of Annex IV apply.

The provisions of Annexes VII and VIII apply to each of the drums to which the provisions of Annex IV apply.

The verification procedure set out in Annex IX applies to the multi-drum household washing machine as a whole, with the verification tolerances applying to each of the parameters determined in application of this annex.