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Herentals 2018/08/29,

To whom it may concern

In June 2018 lead was proposed and added as a new REACH SVHC.

Henco Industries NV declares that all our brass alloys contain a lead % which is higher than the allowed 0.1% as stated in the REACH SVHC.

Since these are all machined brass parts with a very low level of lead, they are covered by REACH exemptions and thus permitted by REACH.

Attached to this communication we also inform you about the composition of the brass alloys used by Henco Industries NV.

Dirk Vroman -Quality Manager Gert Schuermans -Marketing & Product Management Director

EURO CW617N



Standard alloy for bars and profiles.

good hot deformability Combines performance with sufficient machinability for chip removal. It is compliant with requirements of the 4MS group for materials in contact with water for human consumption. It can be used in various applications: valves, taps, accessories for plumbing and heating systems, bolts, handles, terminals and components in general.

NAME OF ALLOY

UNI EN: CW617N - CuZn40Pb2

ASTM: C37700 DIN: 2.0402 BS: CZ122

GOST: LS59-2

CHEMICAL COMPOSITION UNI EN 12165 ED.2016								
Cu	Pb*	Sn	Fe	Ni*	Al	Si*	Zn	Other elements
min. 57.0 max. 59.0 %	1.6 2.2 %	≤0.3 %	≤0.3 %	≤0.1 %	≤0.05 %	≤0.03 %	difference	≤0.2 %

^{*}Limitation according 4MS. Elements not listed must be ≤0.02 %. Group of restriction of the surface in contact with drinking water: B,C.

HEAT TREATMENTS

STRESS RELIEVING

Allows for redistribution of tensions induced by mechanical processing, reducing the risk of stress corrosion cracking.

The treatment consists of heating the items to 200°C - 250°C for 2 hours and cooling within the furnace.

OTHER TREATMENTS

No other heat treatments are required.

TECHNOLOGICAL PROPE	RTIES	low exceller			
Structure	α+β	Machinability			
Density	8.4 kg/cm ²	Weldability			
Electrical conductivity	27% IACS	Hot forming			
Coeff. of thermal expansion	20.7 10 ⁻⁶ /K	Cold forming			
Thermal conductivity*	120 W/(m K)	Corrosion resistance**	Not resistant		
Specific heat	375 J/(kg K)	*at room temperature **use care to ascertain compatibility with chemical substances			
Elasticity module	105 kN/mm ²				
Melting point	880-895 °C				



CZ132 CW602N



Standard anti dezincification alloy for hot forging.

A special alloy which is compliant with European standards and has extremely low dezincification values. The excellent properties of hot deformability combined with good machinability for chip removal make it ideal for processing following stamping. It is not compliant with the requirements of DIN 50930/6 and is therefore not suitable to be in contact with drinking water in 4MS adherent countries. It can however be used in environments where resistance to hostile environments limits the use of traditional brasses.

NAME OF ALLOY

UNI EN: CW602N - CuZn36Pb2As **ASTM:** C35330 **BS:** CZ132

CHEMICAL COMPOSITION UNI EN 12165 ED.2016									
Cu	Pb	Sn	Fe	Ni	Al	Mn	As	Zn	Other elements
min. 61.0 max 63.0 %	1.7 2.8 %	≤0.1 %	≤0.1 %	≤0.3 %	≤0.05 %	≤0.1 %	0.02 0.15 %	diff.	≤0.2 %

HEAT TREATMENTS

SOLUBILIZATION OF RESIDUAL β PHASE

To optimise the material's corrosion resistance a thermal treatment between 500°C and 550°C for 2 hours and cooling within the furnace is required.

This treatment following hot forging allows solubilization of the residual beta phase to render the material resistant to dezincification.

The omission of this treatment does not allow the alloy to offer the anti-dezincification performance that it is designed for.

STRESS RELIEVING

Allows for redistribution of tensions induced by mechanical processing, reducing the risk of stress corrosion cracking.

The treatment consists of heating the items to 200°C - 250°C for 2 hours and cooling within the furnace.

TECHNOLOGICAL PROPE	RTIES	low [excellen		
Structure	α	Machinability			
Density	8.5 kg/cm²	Weldability			
Electrical conductivity	26% IACS	Hot forming			
Coeff. of thermal expansion	20.5 10 ⁻⁶ /K	Cold forming			
Thermal conductivity*	117 W/(m K)	Corrosion resistance**	<100 μm		
Specific heat	377 J/(kg K)	*at room temperature **use care to ascertain compatibility with chemical substances			
Elasticity module	103 kN/mm ²				
Melting point	880-910 °C				

