

# Special Profiles: Solutions for different applications



The satisfaction of our customers' requests is the guarantee of our high standards compliance and quality consistency



# Tailoring the best solutions

**ASBW** has a wide experience and know-how in the making of special profiles and sections. As a result, from the close cooperation with our customers, through the analysis of drawings and specifications from our specialized team of technicians, it was possible to answer to our customer's most specific, complex and demanding requirements.

Through decades of investigation, development and expertise, allied with an endless chase for improvement and product competitiveness, based on the quality of the alloys and the flexibility of their production, it was possible to develop the chemical compositions of **ASBW**'s sections and profiles, providing to our customers the desired solutions to achieve the aimed results for their production processes.

**ASBW** compromise to its customers is to provide assistance and advisement since the concept stage, through the sampling phase until the release for its production and along this process.

#### **Distinguishing parameters**

**ASBW** raw materials derivate mainly from metal recovery facilities and are rigorously inspected and categorized, promoting this way both a sustainable development and precision in chemical composition and metallurgical properties of our products.

The special profiles and sections produced at **ASBW** are consistent with the requirements aimed by our customers for their parts:

- Precise chemical composition
- Excellent filling of the mold cavities
- Enhanced metallurgical properties, leading to a refined grain size, enabling the production of parts with complex geometries
- Product supplied near the finish shape, most of the cases, being only needed to cut the section to the desired length to obtain the finished part.

# **Market applications**

**ASBW**'s range of brass profiles and sections answer to the most diverse and demanding parameters for all the utmost complex applications for multiple industries:

- Window frames
- Cold bended parts
- Water faucets and fittings industries
- Decorative and artistic objects

# **Quality setting and inspection**

At **ASBW**, our quality standard setting starts at the raw materials reception and selection, to ensure the high standards compliance.

Every profile and section are studied and optimised in terms of chemical composition, taking into consideration the best compromise between chemical composition and microstructure as well as mechanical characteristics, tensile strength elongation and hardness. By standard, **ASBW** brass profiles and sections are thermally stress relieved, ensuring the product quality and the desired behaviour as finished part, already in service.

#### **Best-selling alloys:**

	Material	designatio	n			Reference chemical composition (%) *					
<b>ASBW</b>	International	EN	UNS	JIS	Cu	Pb	Al	Zn			
B14**	CuZn39Pb3	CW614N	C38500	C3603 C3604	58,0	3,0	0,03	Rem.			
B21	CuZn43Pb2Al	CW624N	-	1	56,0	2,3	0,3	Rem.			

<sup>\*</sup> Deviations from these values may occur within the restrictions of the relevant standard specifications.

<sup>\*\*</sup> Restrictions to the chemical composition according to 4 MS Common Composition List, for drinking water applications, on customer request.

# All available alloys

			Allo	oys						Refe	rence		mical C ain Eler				(p/p)
	ASB W	International	EN	UNS	JIS	FURTHER RESTRICTIONS	Cu	Pb	Ni	Fe	As	Sn	Al	Bi	Mn	Si	Zn
	B01	CuZn35Pb1	CW600N	C34000	-	-	63,0	1,2	0,2	0,1	-	0,1	0,03	-	-	-	Rem.
	B02*	CuZn35Pb1.5AlAs	CW625N	-	ı	4 MS Common Approach, Part B	63,0	1,4	0,1	0,2	0,1	0,2	0,6	-	-	1	Rem.
	B03	CuZn37Pb1	CW605N	C35000	C3712	-	62,0	1,2	0,2	0,2	-	0,2	0,03	-	-	-	Rem.
	B04	CuZn36Pb3	CW603N	C36000	C3601 C3602 C3603	4 MS Common Approach, Part B	61,0	3,0	0,2	0,2	-	0,1	0,03	-	-	-	Rem.
	B06	CuZn39Pb2Sn	CW613N	-	C3771	-	59,5	2,1	0,2	0,2	-	0,4	0,05	-	-	-	Rem.
	B07	CuZn39Pb1	CW611N	-	C3771	-	59,5	1,2	0,2	0,2	-	0,2	0,03	-	-	-	Rem.
ys	В08	CuZn39Pb0,5	CW610N	C36500	C4641	-	60,0	0,5	0,2	0,1	-	0,2	0,03	-	1	-	Rem.
Lead Containing Alloys	B09*	CuZn39Pb2	CW612N	C37700	C3771	4 MS Common Approach, Part B	59,5	2,0	0,2	0,2	-	0,2	0,03	-	-	-	Rem.
	B10	CuZn36Pb2As <sup>a</sup>	CW602N	C35330	-	-	62,0	2,3	0,2	0,1	0,1	0,1	0,03	-	-	-	Rem.
	B11	CuZn37Pb2	CW606N	C35300	C3601	-	61,5	2,0	0,2	0,1	-	0,1	0,03	-	-	-	Rem.
	B12	CuZn35Pb2	CW601N	C34200 C34500	C3601	-	62,5	2,0	0,2	0,1	1	0,1	0,03	-	-	1	Rem.
	B13*	CuZn40Pb2	CW617N	C37800 C38000	C3603 C3604	4 MS Common Approach, Part B	58,0	2,0	0,1	0,2	-	0,2	0,03	-	-	-	Rem.
	B14*	CuZn39Pb3	CW614N	C38500	C3603 C3604	4 MS Common Approach, Part B	58,0	3,0	0,2	0,2	1	0,2	0,03	-	-	1	Rem.
	B15	CuZn38Pb2	CW608N	C37700	C3771	-	60,5	2,0	0,2	0,1	-	0,1	0,03	-	-	-	Rem.
	B16	CuZn38Pb1	CW607N	C37000	C3712	-	60,5	1,0	0,2	0,1	-	0,1	0,03	-	-	-	Rem.
	B21	CuZn43Pb2Al	CW624N	-	-	-	56,5	2,5	0,2	0,2	-	0,2	0,3	-	-	-	Rem.
	B24	CuZn37Mn3Al2PbS i	CW713R	C67420	C6782	-	58,0	0,6	0,5	0,5	-	0,2	1,8	-	1,0	0,7	Rem.
Low Lead Alloys	B17 *	CuZn42	CW510L	C28500	-	4 MS Common Approach, Part B	58,0	0,1	0,2	0,2	-	0,2	0,03	-	-	-	Rem.
	B18 *	CuZn40	CW509L	-	C3712	4 MS Common Approach, Part B	60,0	0,1	0,2	0,1	1	0,1	0,03	-	-	1	Rem.
	B19*	CuZn37	CW508L	C27200	C2800	4 MS Common Approach, Part B	63,0	0,1	0,2	0,1	-	0,1	0,03	-	1	-	Rem.
	B20	CuZn38As	CW511L	C27453	-	4 MS Common Approach, Part B	62,5	0,1	0,2	0,1	0,1	0,1	0,03	-	-	1	Rem.
	B22	CuZn40Bi0,7Al0,5P b0,1**	According to SDWA of EPA****	-	-	-	58,0	0,1	0,2	0,2	-	0,2	0,03	0,7	-	-	Rem.
	B23	CuZn40Bi0,7Al0,5P b0,2**	According to SDWA of EPA****	-	-	-	58,0	0,2	0,2	0,2	-	0,2	0,03	0,7	-	-	Rem.

<sup>\*</sup> For drinking water applications, there are restrictions to the chemical composition the materials listed in this table according to the specified in the 4 MS Common Composition List. In this case, on the ordering information must be specified the reference for DW (drinking water). This information is mandatory in the cases which the product is used in drinking water applications according to the 4 MS Common Composition List and not to be given in the other cases.

<sup>\*\*</sup> Internal Designation.

<sup>\*\*\*</sup> Deviations from these values may occur within the restrictions of the relevant standard specifications.

<sup>\*\*\*\*</sup> Environment Protection Agency (EPA), Safe Water Drinking Act (SDWA) - ANSI/NSF Standard 61 and Copper Development Association (CDA)

#### **Quality and environment**

**ASBW** has a certified quality management system in place according to EN ISO 9001:2015 and is committed to its customers in continuously improve the quality of production.

Environment is a concern and global responsibility, to which **ASBW** is compliant with. **ASBW** adopts a policy of Social Responsibility, reducing the environmental impact of its activities. Believing in the compatibility between technological progress and environmental preservation, we are licensed at environmental level with APA (Environmental Agency) license number 86120.

# **Technical service**

At **ASBW** we see our customers as business partners. Considering that, we supply not only brass profiles and sections but also our expertise and technical know-how that results from decades of experience and research. Our commitment is on-time discussion of any aspect of your production from the planning stage, providing you with detailed information about product properties, further processing and delivery options.

# **Packaging**

#### Size range up to 10 mm

The profiles and sections are packed loose in a wooden box and protected with oiled paper (net weight of approx. 500 kg). Each box is strapped with 4 steel straps to ensure material integrity during shipping.

#### Size range above 10 mm

**ASBW** profiles and sections are supplied by standard in bundles either of approximately 1.000 kg or 500 kg. Different bundle weights are also possible upon costumer's request. Each bundle is steel strapped three times on cardboard and both ends are protected with burlap, to ensure the material integrity during the transportation

#### Labeling

In order to ensure, the traceability according to NP EN ISO 9001:2015, each bale (wooden box or bundle) is marked with a label indicating the details mentioned below:

- customer
- number of customer's order
- EN Standard of the material
- ASBW material code
- rod length
- ASBW's PO number
- ASBW's Quality Approval Seal