



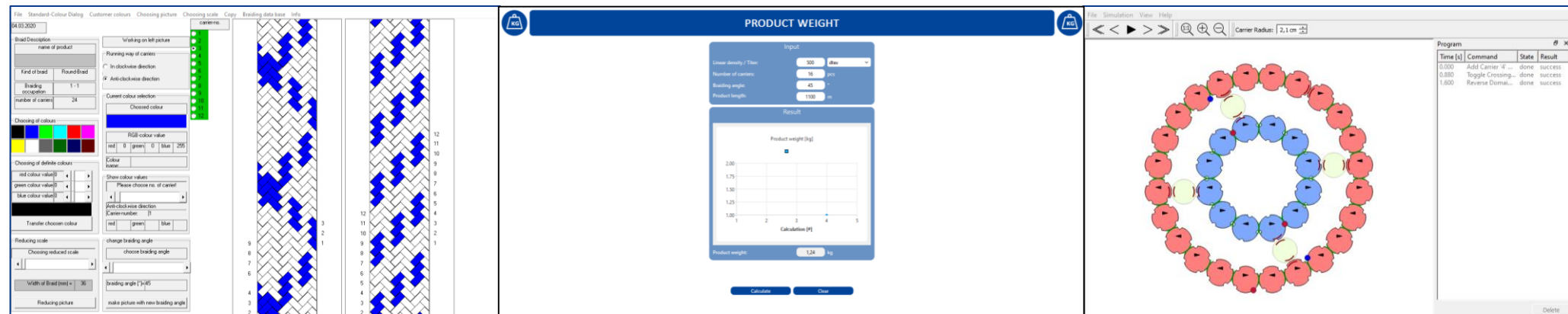
## Software solutions for the braiding world

The textile industry – although it is one of the oldest industries in human history - has always been a leader in innovation. The same applies for the braiding world and Herzog. To help you stay at the top, we support you with various software solutions.

# Standard and custom-made software solutions

The Herzog software family **Computer Aided Braiding** offers solutions for various tasks in your braiding business.

If you would like to take a closer look at your braiding process, we offer individual solutions for process data acquisition.



# The Herzog software family Computer Aided Braiding

Under Computer Aided Braiding we offer three software programs



## **CAB Calculation**

All the calculations you need  
for rope design and machine  
operation



## **CAB Design**

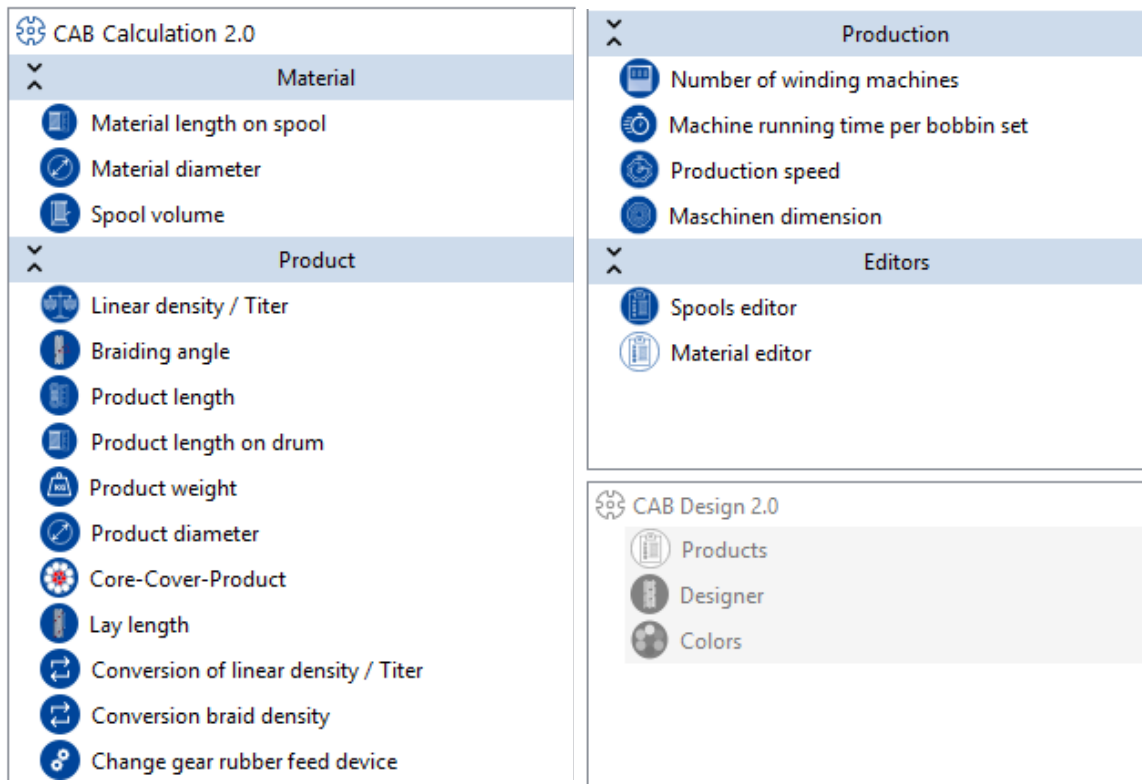
Simply prepare images of all  
types of different rope designs  
Design your braid with a vast  
choice of colors



## **CAB Soft**

Simulation of carrier paths on  
advanced braiding machines

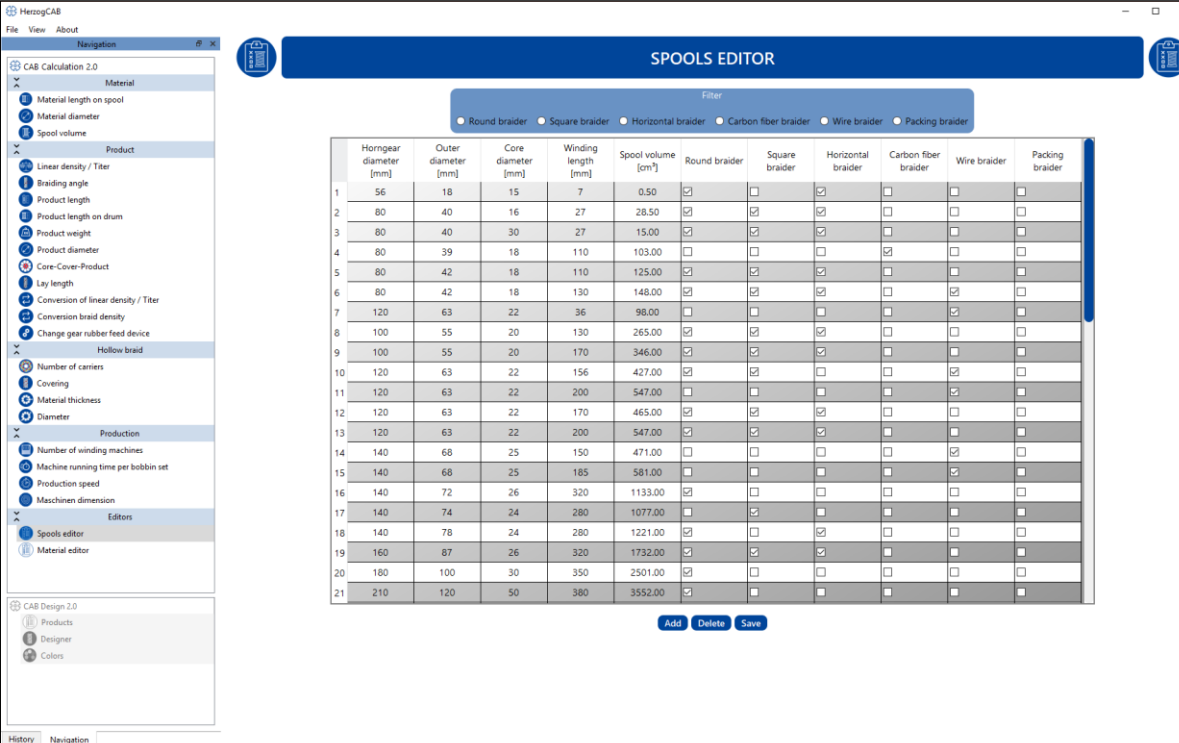
# CAB Calculation



CAB Calculation offers all necessary calculation tools for running a braiding production.

- Conversions between yarn value counts and lay length definitions
- Calculations around different yarn types to determine titers based on geometries or geometries based on titers
- Possible braid production based on sizes and machine models

# CAB Calculation



**SPOOLS EDITOR**

Filter:  Round braider  Square braider  Horizontal braider  Carbon fiber braider  Wire braider  Packing braider

	Horn gear diameter [mm]	Outer diameter [mm]	Core diameter [mm]	Winding length [mm]	Spool volume [cm <sup>3</sup> ]	Round braider	Square braider	Horizontal braider	Carbon fiber braider	Wire braider	Packing braider
1	56	18	15	7	0.50	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
2	80	40	16	27	28.50	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
3	80	40	30	27	15.00	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
4	80	39	18	110	103.00	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
5	80	42	18	110	125.00	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
6	80	42	18	130	148.00	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
7	120	63	22	36	98.00	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
8	100	55	20	130	265.00	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
9	100	55	20	170	346.00	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
10	120	63	22	156	427.00	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
11	120	63	22	200	547.00	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
12	120	63	22	170	465.00	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
13	120	63	22	200	547.00	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
14	140	68	25	150	471.00	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
15	140	68	25	185	581.00	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>
16	140	72	26	320	1133.00	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
17	140	74	24	280	1077.00	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
18	140	78	24	280	1221.00	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
19	160	87	26	320	1732.00	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
20	180	100	30	350	2501.00	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>
21	210	120	50	380	3552.00	<input checked="" type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>	<input type="checkbox"/>

Add Delete Save

CAB Calculation offers many functions

- Production output and runtimes of machines
- Productivity of different bobbin winders in combination with braiding machines
- Detailed calculations on core cover ropes
- Hose and preform cover calculation

# CAB Design



It used to be a lot of work to make a rope sample for your customer

- Making braid samples for customers is a labor-intensive and costly business
- Getting short amounts of yarn with the correct color or dye it yourself
- Setting up the machine to braid a short piece
- Sending the sample to the customer only to learn that he wants it just a little bit different

With CAB Design you can create any kind of braid design simply on your computer

# CAB Design

**Braid Description**

name of product  
Ru\_40\_22

Kind of braid: Round-Braid

Braiding occupation: 2 - 2

number of carriers: 40

**Choosing of colours**

Choosing of definite colours

red colour value: 0  
green colour value: 0  
blue colour value: 0

Transfer chosen colour

Reducing scale

Choosing reduced scale

Width of Braid (mm) = 36

Working on left picture

Running way of carriers

In clockwise direction  
 Anti-clockwise direction

Current colour selection

Chooosed colour

RGB-colour value  
red 255 green 128 blue 64

Colour name:

Show colour values

Please choose no. of carrier!

Carrier-number: 1

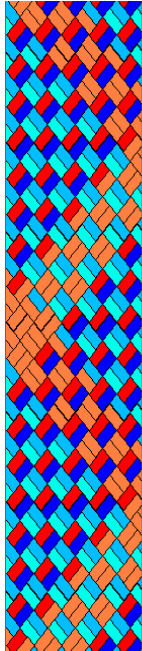
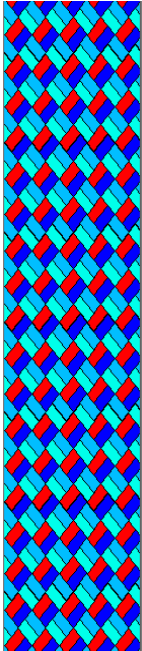
Anti-clockwise direction

change braiding angle

choose braiding angle

braiding angle [°]=50

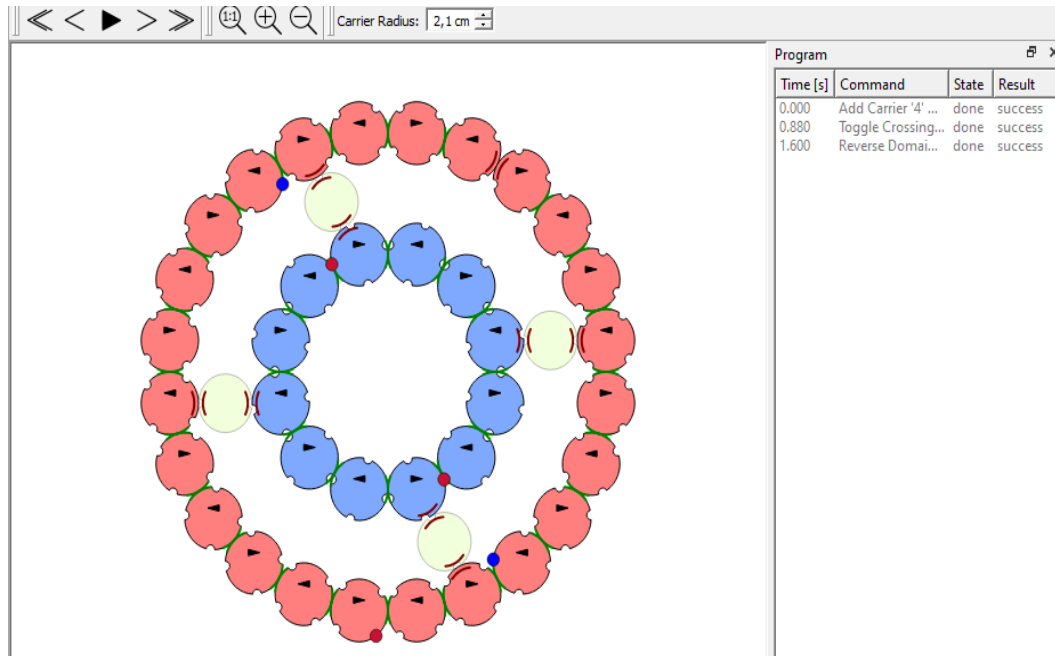
2  
3  
4  
5  
6  
7  
8  
9  
10  
11  
12  
13  
14  
15  
16  
17  
18  
19  
20

CAB Design offers many functions

- Round braids
- Flat / Lace braids
- One over two constructions
- Tandem constructions
- Half occupied constructions
- Variable braiding angles
- Standard and customer color database
- Cut and copy your images into all regular office programs

# CAB Soft



CAB Soft helps to create and simulate step sequences for all advanced Herzog braiding machines

- Placing, deleting and color changing of carriers
- Switching of crossings
- Enabling, disabling and direction change of horn gear domains
- Anti-collision testing



# MDA - Machine data acquisition

Solutions by HERZOG

Basic braiding machine with mechanical take-off and Logo control	Basic braiding machine with mechanical take-off, Logo control and display	Braiding machine with PLC control
--	---	-----------------------------------



Order no.	88206	88207	88209
Display	Without Display	Logo Display	7"-Display of PLC control
Signal type	Modbus-TCP / S7-Protocol	Modbus-TCP / S7-Protocol	S7-Protocol / OPC / UA
Signal type upon request	OPC / UA via IIoT-Gateway	OPC / UA via IIoT-Gateway	Profibus / Modbus / MQTT
Scope of supply	<ul style="list-style-type: none"> <li>Adapted electrical cabinet</li> <li>Siemens Logo control</li> <li>Siemens Logo extension module</li> <li>Basic programme</li> </ul>	<ul style="list-style-type: none"> <li>As 88206</li> <li>Siemens Logo Display to indicate error &amp; cause</li> </ul>	<ul style="list-style-type: none"> <li>Programme adaption</li> <li>License for OPC / UA (not retrofitable)</li> </ul>
Network connection	External network socket at the electric cabinet	External network socket at the electric cabinet	External network socket at the electric cabinet
Isolated signals on control, ready for collection  (depending on features of the braiding machine)	<ul style="list-style-type: none"> <li>Start, Stop, Standstill time</li> <li>Carrier protection</li> <li>Guard for warp threads or core material</li> <li>Pay-off creel for core material</li> <li>Thread breakage detection</li> <li>Braiding die, braiding point</li> <li>Meter counter, central lubrication</li> <li>Heat setting unit, pay-off / take-up</li> </ul>		<ul style="list-style-type: none"> <li>As 88206 / 88207</li> <li>Horn gear speed</li> <li>Take-off speed</li> <li>Fault of horn gear drive</li> <li>Fault of take-off drive</li> <li>No standstill time</li> </ul>



## For more information please contact us



Herzog GmbH  
Am Alexanderhaus 160  
D 26127 Oldenburg



+49 441 3008-0



[info@herzog-online.com](mailto:info@herzog-online.com)



[www.herzog-online.com](http://www.herzog-online.com)

