# Porter Bałtycki #4

- Gravity 21.3 BLG
- ABV 9.5 %
- IBU **46**
- SRM 31.7
- Style Baltic Porter

#### **Batch size**

- Expected quantity of finished beer 16 liter(s)
- Trub loss 5 %
- Size with trub loss 16.8 liter(s)
- · Boil time 60 min
- Evaporation rate 10 %/h
- Boil size 19.4 liter(s)

#### **Mash information**

- Mash efficiency 74 %
- Liquor-to-grist ratio 3 liter(s) / kg
- Mash size 20.9 liter(s)
- Total mash volume 27.8 liter(s)

### **Steps**

- Temp 64 C, Time 45 min
  Temp 68 C, Time 45 min
  Temp 72 C, Time 10 min
- Temp 78 C, Time 10 min

### Mash step by step

- Heat up 20.9 liter(s) of strike water to 71.3C
- Add grains
- Keep mash 45 min at 64C
- Keep mash 45 min at 68C
- Keep mash 10 min at 72C
- Keep mash 10 min at 78C
- Sparge using 5.5 liter(s) of 76C water or to achieve 19.4 liter(s) of wort

### **Fermentables**

Туре	Name	Amount	Yield	EBC
Grain	Weyermann Pilsner Malt	2.6 kg <i>(37.4%)</i>	80.5 %	3.5
Grain	Weyermann Vienna Malt	1.6 kg <i>(23%)</i>	79 %	7.5
Grain	Weyermann Munich II Malt	1.6 kg <i>(23%)</i>	78 %	22.5
Grain	Weyermann Caramunich II Malt	0.2 kg <i>(2.9%)</i>	73 %	120
Grain	Weyermann Caraaroma Malt	0.2 kg <i>(2.9%)</i>	74 %	400
Grain	Weyermann Chocolate Wheat Malt	0.2 kg <i>(2.9%)</i>	65 %	1050
Grain	Castle Malting Chateau Caffe Light Malt	0.2 kg <i>(2.9%)</i>	77 %	250
Grain	Rye Flakes	0.3 kg <i>(4.3%)</i>	80 %	3.75
Grain	Viking Malt Roasted Barley	0.05 kg <i>(0.7%)</i>	63 %	1050

# Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Magnum PL 2023	41 g	60 min	11 %

## **Yeasts**

Name	Туре	Form	Amount	Laboratory
Saflager W 34/70	Lager	Slant	500 ml	Fermentis

### **Extras**

Туре	Name	Amount	Use for	Time
Other	Rice Husk	100 g	Mash	
Fining	Whirlfloc T	1.25 g	Boil	10 min