

Iga

- Gravity **15.4 BLG**
- ABV **6.5 %**
- IBU **69**
- SRM **8.8**
- Style **Düsseldorf Altbier**

Batch size

- Expected quantity of finished beer **10 liter(s)**
- Trub loss **5 %**
- Size with trub loss **10.5 liter(s)**
- Boil time **60 min**
- Evaporation rate **10 %/h**
- Boil size **12.7 liter(s)**

Mash information

- Mash efficiency **80 %**
- Liquor-to-grist ratio **3.5 liter(s) / kg**
- Mash size **9.4 liter(s)**
- Total mash volume **12.1 liter(s)**

Steps

- Temp **63 C**, Time **40 min**
- Temp **72 C**, Time **20 min**

Mash step by step

- Heat up **9.4 liter(s)** of strike water to **69.2C**
- Add grains
- Keep mash **40 min** at **63C**
- Keep mash **20 min** at **72C**
- Sparge using **6 liter(s)** of **76C** water or to achieve **12.7 liter(s)** of wort

Fermentables

Type	Name	Amount	Yield	EBC
Grain	Viking Pale Ale malt	0.9 kg (33.5%)	90 %	5
Grain	Strzegom Monachijski typ II	1.1 kg (40.9%)	90 %	22
Grain	Jęczmień niesłodowany	0.16 kg (5.9%)	75 %	2
Grain	Strzegom Karmel 30	0.42 kg (15.6%)	75 %	30
Grain	Carabelge	0.11 kg (4.1%)	80 %	30

Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Marynka	15 g	30 min	6.5 %
Boil	Lunga	36 g	30 min	10 %

Yeasts

Name	Type	Form	Amount	Laboratory
FM51 Grodzie Dębowe	Wheat	Slant	70 ml	Fermentum Mobile

Extras

Type	Name	Amount	Use for	Time
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Fining	Whirlfloc T	2 g	Boil	10 min
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