

apa 123

- Gravity **13.3 BLG**
- ABV **5.5 %**
- IBU **50**
- SRM **4.8**

Batch size

- Expected quantity of finished beer **25 liter(s)**
- Trub loss **5 %**
- Size with trub loss **26.8 liter(s)**
- Boil time **60 min**
- Evaporation rate **10 %/h**
- Boil size **32.2 liter(s)**

Mash information

- Mash efficiency **75 %**
- Liquor-to-grist ratio **5 liter(s) / kg**
- Mash size **32.5 liter(s)**
- Total mash volume **39 liter(s)**

Steps

- Temp **70 C**, Time **60 min**

Mash step by step

- Heat up **32.5 liter(s)** of strike water to **75C**
- Add grains
- Keep mash **60 min** at **70C**
- Sparge using **6.2 liter(s)** of **76C** water or to achieve **32.2 liter(s)** of wort

Fermentables

Type	Name	Amount	Yield	EBC
Grain	Weyermann - Pale Ale Malt	5 kg (76.9%)	85 %	7
Grain	Weyermann pszeniczny jasny	1 kg (15.4%)	80 %	6
Grain	Płatki owsiane	0.5 kg (7.7%)	85 %	3

Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Galaxy	30 g	60 min	15 %
Boil	Galaxy	15 g	10 min	15 %
Boil	Amarillo	15 g	10 min	9.5 %
Aroma (end of boil)	Galaxy	15 g	1 min	15 %
Aroma (end of boil)	Amarillo	15 g	1 min	9.5 %
Dry Hop	Citra	30 g	---	12 %
Dry Hop	Amarillo	30 g	---	9.5 %
Dry Hop	Galaxy	30 g	---	15 %

Yeasts

Name	Type	Form	Amount	Laboratory
US 05	Ale	Dry	11 g	---