

Niskoalkoholowe

- Gravity **9 BLG**
- ABV **3.5 %**
- IBU **49**
- SRM **3.2**
- Style **American Pale Ale**

Batch size

- Expected quantity of finished beer **20 liter(s)**
- Trub loss **10 %**
- Size with trub loss **24 liter(s)**
- Boil time **60 min**
- Evaporation rate **10 %/h**
- Boil size **28.6 liter(s)**

Mash information

- Mash efficiency **75 %**
- Liquor-to-grist ratio **3 liter(s) / kg**
- Mash size **12 liter(s)**
- Total mash volume **16 liter(s)**

Steps

- Temp **66 C**, Time **60 min**
- Temp **72 C**, Time **10 min**
- Temp **78 C**, Time **5 min**

Mash step by step

- Heat up **12 liter(s)** of strike water to **73.7C**
- Add grains
- Keep mash **60 min** at **66C**
- Keep mash **10 min** at **72C**
- Keep mash **5 min** at **78C**
- Sparge using **20.6 liter(s)** of **76C** water or to achieve **28.6 liter(s)** of wort

Fermentables

Type	Name	Amount	Yield	EBC
Grain	Strzegom Pale Ale	2 kg (50%)	79 %	6
Grain	Bestmalz Carmel Pils	0.5 kg (12.5%)	75 %	5
Grain	Płatki owsiane	1 kg (25%)	85 %	3
Grain	Płatki pszeniczne	0.5 kg (12.5%)	85 %	3

Hops

Use for	Name	Amount	Time	Alpha acid
Boil	lunga	30 g	30 min	12.4 %
Boil	Amarillo	50 g	10 min	8.8 %
Boil	Amarillo	50 g	0 min	8.8 %
Dry Hop	Citra	50 g	7 day(s)	12 %

Yeasts

Name	Type	Form	Amount	Laboratory
Safale US-05	Ale	Dry	11.5 g	---