

APA Patryka

- Gravity **11 BLG**
- ABV **4.4 %**
- IBU **12**
- SRM **3.9**
- Style **American Pale Ale**

Batch size

- Expected quantity of finished beer **30 liter(s)**
- Trub loss **5 %**
- Size with trub loss **31.5 liter(s)**
- Boil time **60 min**
- Evaporation rate **10 %/h**
- Boil size **38 liter(s)**

Mash information

- Mash efficiency **80 %**
- Liquor-to-grist ratio **3.27 liter(s) / kg**
- Mash size **19.9 liter(s)**
- Total mash volume **26 liter(s)**

Steps

- Temp **52 C**, Time **10 min**
- Temp **64 C**, Time **20 min**
- Temp **63 C**, Time **40 min**
- Temp **78 C**, Time **5 min**

Mash step by step

- Heat up **19.9 liter(s)** of strike water to **56.9C**
- Add grains
- Keep mash **10 min** at **52C**
- Keep mash **40 min** at **63C**
- Keep mash **20 min** at **64C**
- Keep mash **5 min** at **78C**
- Sparge using **24.2 liter(s)** of **76C** water or to achieve **38 liter(s)** of wort

Fermentables

Type	Name	Amount	Yield	EBC
Grain	Viking Pale Ale malt	5.5 kg (90.2%)	80 %	5
Grain	Karmelowy Jasny 30EBC	0.2 kg (3.3%)	75 %	30
Grain	Pszeniczny	0.4 kg (6.6%)	85 %	4

Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Galaxy	10 g	60 min	14.5 %
Whirlpool	Cascade	11 g	1 min	7.1 %
Whirlpool	Centennial	11 g	1 min	9.4 %
Whirlpool	Amarillo	15 g	1 min	8.8 %
Dry Hop	Cascade	20 g	4 day(s)	7.1 %
Dry Hop	Centennial	20 g	4 day(s)	9.4 %
Dry Hop	Amarillo	25 g	4 day(s)	8.8 %

Yeasts

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