

IPA polskie chmiele

- Gravity **14.5 BLG**
- ABV **6 %**
- IBU **59**
- SRM **5.3**
- Style **American IPA**

Batch size

- Expected quantity of finished beer **38 liter(s)**
- Trub loss **5 %**
- Size with trub loss **41.8 liter(s)**
- Boil time **60 min**
- Evaporation rate **7 %/h**
- Boil size **47.6 liter(s)**

Mash information

- Mash efficiency **80 %**
- Liquor-to-grist ratio **3 liter(s) / kg**
- Mash size **33.5 liter(s)**
- Total mash volume **44.6 liter(s)**

Steps

- Temp **68 C**, Time **60 min**
- Temp **72 C**, Time **20 min**
- Temp **76 C**, Time **3 min**

Mash step by step

- Heat up **33.5 liter(s)** of strike water to **76C**
- Add grains
- Keep mash **60 min** at **68C**
- Keep mash **20 min** at **72C**
- Keep mash **3 min** at **76C**
- Sparge using **25.3 liter(s)** of **76C** water or to achieve **47.6 liter(s)** of wort

Fermentables

Type	Name	Amount	Yield	EBC
Grain	Viking Pale Ale malt	8 kg (71.7%)	80 %	5
Grain	Weyermann - Carapils	1 kg (9%)	78 %	4
Grain	Strzegom Karmel 150	0.16 kg (1.4%)	75 %	150
Grain	Płatki pszeniczne	1 kg (9%)	60 %	3
Grain	Płatki owsiane	1 kg (9%)	60 %	3

Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Marynka	100 g	50 min	10 %
Aroma (end of boil)	Lublin (Lubelski)	100 g	2 min	4 %
Whirlpool	EXP 2/20	100 g	10 min	7.5 %

Yeasts

Name	Type	Form	Amount	Laboratory
Safale US-05	Ale	Dry	23 g	Fermentis