

Żytnie AIPA

- Gravity **14 BLG**
- ABV **5.8 %**
- IBU **64**
- SRM **8.7**
- Style **Rye IPA**

Batch size

- Expected quantity of finished beer **20 liter(s)**
- Trub loss **10 %**
- Size with trub loss **23 liter(s)**
- Boil time **60 min**
- Evaporation rate **15 %/h**
- Boil size **28.8 liter(s)**

Mash information

- Mash efficiency **80 %**
- Liquor-to-grist ratio **3.3 liter(s) / kg**
- Mash size **19.1 liter(s)**
- Total mash volume **24.9 liter(s)**

Steps

- Temp **50 C**, Time **20 min**
- Temp **66 C**, Time **60 min**
- Temp **72 C**, Time **25 min**
- Temp **78 C**, Time **5 min**

Mash step by step

- Heat up **19.1 liter(s)** of strike water to **54.6C**
- Add grains
- Keep mash **20 min** at **50C**
- Keep mash **60 min** at **66C**
- Keep mash **25 min** at **72C**
- Keep mash **5 min** at **78C**
- Sparge using **15.5 liter(s)** of **76C** water or to achieve **28.8 liter(s)** of wort

Fermentables

Type	Name	Amount	Yield	EBC
Grain	Pale Malt (2 Row) UK	4 kg (69%)	78 %	6
Grain	Żytni	1.4 kg (24.1%)	85 %	8
Grain	Strzegom Karmel 150	0.4 kg (6.9%)	75 %	150

Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Warrior	15 g	60 min	15.5 %
Boil	Mosaic	30 g	15 min	10 %
Boil	Mosaic	30 g	10 min	10 %
Boil	Cascade	25 g	10 min	6 %
Aroma (end of boil)	Sorachi Ace	30 g	5 min	10 %
Aroma (end of boil)	Zythos	30 g	5 min	11 %
Dry Hop	Cascade	40 g	7 day(s)	6 %

Yeasts

Name	Type	Form	Amount	Laboratory
Safale US-05	Ale	Slant	200 ml	Fermentis