

## Session IPA

- Gravity **11.7 BLG**
- ABV **4.7 %**
- IBU **71**
- SRM **4.6**
- Style **American Pale Ale**

### Batch size

- Expected quantity of finished beer **12.5 liter(s)**
- Trub loss **4 %**
- Size with trub loss **13 liter(s)**
- Boil time **70 min**
- Evaporation rate **20 %/h**
- Boil size **16.5 liter(s)**

### Mash information

- Mash efficiency **79 %**
- Liquor-to-grist ratio **3.4 liter(s) / kg**
- Mash size **8.9 liter(s)**
- Total mash volume **11.5 liter(s)**

### Steps

- Temp **66 C**, Time **40 min**
- Temp **72 C**, Time **40 min**
- Temp **76 C**, Time **10 min**

### Mash step by step

- Heat up **8.9 liter(s)** of strike water to **72.8C**
- Add grains
- Keep mash **40 min** at **66C**
- Keep mash **40 min** at **72C**
- Keep mash **10 min** at **76C**
- Sparge using **10.2 liter(s)** of **76C** water or to achieve **16.5 liter(s)** of wort

### Fermentables

Type	Name	Amount	Yield	EBC
Grain	Strzegom Pale Ale	2.5 kg (95.2%)	79 %	6
Grain	Carahell	0.125 kg (4.8%)	77 %	26

### Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Columbus/Tomahawk/Zeus	15 g	60 min	16.8 %
Boil	Centennial	10 g	15 min	9.7 %
Boil	Simcoe	10 g	15 min	13.2 %
Aroma (end of boil)	Centennial	10 g	0 min	9.7 %
Aroma (end of boil)	Simcoe	10 g	0 min	13.2 %
Aroma (end of boil)	Columbus/Tomahawk/Zeus	5 g	0 min	16.8 %
Dry Hop	Centennial	30 g	5 day(s)	10.5 %
Dry Hop	Simcoe	30 g	5 day(s)	13.2 %

### Yeasts

Name	Type	Form	Amount	Laboratory
Safale US-05	Ale	Dry	5 g	Safale

## Extras

Type	Name	Amount	Use for	Time
Water Agent	gips piwowarski	2 g	Mash	60 min