

# herbata

- Gravity **14 BLG**
- ABV ---
- IBU **44**
- SRM **14.1**
- Style **American IPA**

## Batch size

- Expected quantity of finished beer **20 liter(s)**
- Trub loss **5 %**
- Size with trub loss **21 liter(s)**
- Boil time **60 min**
- Evaporation rate **10 %/h**
- Boil size **25.3 liter(s)**

## Mash information

- Mash efficiency **75 %**
- Liquor-to-grist ratio **3 liter(s) / kg**
- Mash size **15.6 liter(s)**
- Total mash volume **20.8 liter(s)**

## Steps

- Temp **66 C**, Time **50 min**
- Temp **72 C**, Time **20 min**
- Temp **76 C**, Time **2 min**

## Mash step by step

- Heat up **15.6 liter(s)** of strike water to **73.7C**
- Add grains
- Keep mash **50 min** at **66C**
- Keep mash **20 min** at **72C**
- Keep mash **2 min** at **76C**
- Sparge using **14.9 liter(s)** of **76C** water or to achieve **25.3 liter(s)** of wort

## Fermentables

Type	Name	Amount	Yield	EBC
Grain	Strzegom Pale Ale	3 kg (57.7%)	79 %	6
Grain	Biscuit Malt	0.2 kg (3.8%)	79 %	45
Grain	Strzegom pszeniczny	0.5 kg (9.6%)	81 %	6
Grain	Strzegom Pilzneński	1 kg (19.2%)	80 %	4
Grain	Strzegom Karmel 150	0.5 kg (9.6%)	75 %	150

## Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Columbus/Tomahawk/Zeus	20 g	60 min	15.5 %
Aroma (end of boil)	Amarill	10 g	10 min	9.5 %
Aroma (end of boil)	Mosaic	15 g	5 min	10 %
Aroma (end of boil)	Cascade	15 g	3 min	6 %

## Yeasts

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

## Extras

Type	Name	Amount	Use for	Time
Flavor	Herbata Green Tea	50 g	Secondary	3 day(s)
Flavor	Herbata Earl Grey	50 g	Secondary	3 day(s)
Water Agent	gips	10 g	Boil	60 min
Other	płatki żytnie	400 g	Mash	20 min