

# Enigma

- Gravity **16.8 BLG**
- ABV **7.1 %**
- IBU **72**
- SRM **6.1**
- Style **American IPA**

## Batch size

- Expected quantity of finished beer **20 liter(s)**
- Trub loss **5 %**
- Size with trub loss **22 liter(s)**
- Boil time **60 min**
- Evaporation rate **11.5 %/h**
- Boil size **26.3 liter(s)**

## Mash information

- Mash efficiency **75 %**
- Liquor-to-grist ratio **3 liter(s) / kg**
- Mash size **21 liter(s)**
- Total mash volume **28 liter(s)**

## Steps

- Temp **65 C**, Time **30 min**
- Temp **72 C**, Time **30 min**

## Mash step by step

- Heat up **21 liter(s)** of strike water to **72.5C**
- Add grains
- Keep mash **30 min** at **65C**
- Keep mash **30 min** at **72C**
- Sparge using **12.3 liter(s)** of **76C** water or to achieve **26.3 liter(s)** of wort

## Fermentables

Type	Name	Amount	Yield	EBC
Grain	Strzegom Pale Ale	5 kg (71.4%)	79 %	6
Grain	Strzegom Pszeniczny	1 kg (14.3%)	81 %	6
Grain	Strzegom Wiedeński	0.5 kg (7.1%)	79 %	10
Grain	Strzegom Monachijski typ I	0.5 kg (7.1%)	79 %	16

## Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Magnum	30 g	60 min	13.5 %
Boil	Marynka	30 g	45 min	10 %
Aroma (end of boil)	Lublin (Lubelski)	30 g	10 min	4 %
Aroma (end of boil)	Sybilla	30 g	10 min	6 %
Dry Hop	Lublin (Lubelski)	60 g	3 day(s)	4 %
Dry Hop	Sybilla	60 g	3 day(s)	6 %

## Yeasts

Name	Type	Form	Amount	Laboratory
Safale S-04	Ale	Dry	11.5 g	---

## Notes

- Szyszki trzeba sypnąć 10-15% więcej niż granulatu  
*Jul 19, 2018, 2:59 PM*