

# PILS 1

- Gravity **13.1 BLG**
- ABV **5.3 %**
- IBU **33**
- SRM **2**
- Style **Bohemian Pilsener**

## Batch size

- Expected quantity of finished beer **22 liter(s)**
- Trub loss **5 %**
- Size with trub loss **23.1 liter(s)**
- Boil time **60 min**
- Evaporation rate **15 %/h**
- Boil size **27.8 liter(s)**

## Mash information

- Mash efficiency **75 %**
- Liquor-to-grist ratio **3 liter(s) / kg**
- Mash size **16.5 liter(s)**
- Total mash volume **22 liter(s)**

## Steps

- Temp **68 C**, Time **60 min**

## Mash step by step

- Heat up **16.5 liter(s)** of strike water to **76C**
- Add grains
- Keep mash **60 min** at **68C**
- Sparge using **16.8 liter(s)** of **76C** water or to achieve **27.8 liter(s)** of wort

## Fermentables

Type	Name	Amount	Yield	EBC
Grain	PILS	4.5 kg (81.8%)	--- %	---
Grain	Monachijski	0.5 kg (9.1%)	80 %	16
Grain	Weyermann - Carapils	0.5 kg (9.1%)	78 %	4

## Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Magnum	15 g	60 min	12 %
Boil	saaz	20 g	20 min	3.5 %
Boil	saaz	15 g	10 min	3.5 %
Boil	saaz	15 g	5 min	3.5 %
Whirlpool	saaz	20 g	10 min	3.5 %
Boil	marynka	10 g	60 min	6 %

## Yeasts

Name	Type	Form	Amount	Laboratory
BAVARIAN LAGER M76	Lager	Dry	10 g	Mangrove Jack's
starter 1l 8h				