

# Pilsner polski ( zestaw z piwoszarnia)

- Gravity **12.6 BLG**
- ABV **5.1 %**
- IBU **45**
- SRM **4.6**
- Style **German Pilsner (Pils)**

## Batch size

- Expected quantity of finished beer **18 liter(s)**
- Trub loss **5 %**
- Size with trub loss **18.9 liter(s)**
- Boil time **60 min**
- Evaporation rate **10 %/h**
- Boil size **22.8 liter(s)**

## Mash information

- Mash efficiency **85 %**
- Liquor-to-grist ratio **4.5 liter(s) / kg**
- Mash size **18 liter(s)**
- Total mash volume **22 liter(s)**

## Steps

- Temp **52 C**, Time **20 min**
- Temp **64 C**, Time **70 min**
- Temp **72 C**, Time **30 min**
- Temp **78 C**, Time **15 min**

## Mash step by step

- Heat up **18 liter(s)** of strike water to **55.6C**
- Add grains
- Keep mash **20 min** at **52C**
- Keep mash **70 min** at **64C**
- Keep mash **30 min** at **72C**
- Keep mash **15 min** at **78C**
- Sparge using **8.8 liter(s)** of **76C** water or to achieve **22.8 liter(s)** of wort

## Fermentables

Type	Name	Amount	Yield	EBC
Grain	Słód Pilsner® 2,5-4,5 EBC Weyermann	3 kg (75%)	80 %	4
Grain	Strzegom Monachijski typ I	1 kg (25%)	79 %	16

## Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Chinook	25 g	60 min	13 %
Aroma (end of boil)	Cascade PL	25 g	10 min	5.2 %

## Yeasts

Name	Type	Form	Amount	Laboratory
GLW35	Lager	Dry	10 g	---