

# Grodziskie

---

- Gravity **7.8 BLG**
- ABV **3 %**
- IBU **22**
- SRM **2.3**
- Style **Grodziskie/Graetzer**

## Batch size

- Expected quantity of finished beer **19 liter(s)**
- Trub loss **5 %**
- Size with trub loss **20.9 liter(s)**
- Boil time **60 min**
- Evaporation rate **10 %/h**
- Boil size **25.1 liter(s)**

## Mash information

- Mash efficiency **75 %**
- Liquor-to-grist ratio **4 liter(s) / kg**
- Mash size **12 liter(s)**
- Total mash volume **15 liter(s)**

## Steps

- Temp **65 C**, Time **60 min**
- Temp **72 C**, Time **20 min**

## Mash step by step

- Heat up **12 liter(s)** of strike water to **70.6C**
- Add grains
- Keep mash **60 min** at **65C**
- Keep mash **20 min** at **72C**
- Sparge using **16.1 liter(s)** of **76C** water or to achieve **25.1 liter(s)** of wort

## Fermentables

Type	Name	Amount	Yield	EBC
Grain	Grodziskie pszeniczny wędzony dębem	3 kg (100%)	80 %	3

## Hops

Use for	Name	Amount	Time	Alpha acid
Boil	lunga	15 g	60 min	11.3 %
Dry Hop	Izabella	50 g	2 day(s)	6 %

## Yeasts

Name	Type	Form	Amount	Laboratory
us-05	Ale	Dry	11.5 g	fermentis

## Extras

Type	Name	Amount	Use for	Time
Fining	whirlfloc	0.5 g	Boil	10 min
Other	łuska ryżowa	200 g	Mash	5 min