

# GRODZISKIE

- Gravity **8.5 BLG**
- ABV **3.3 %**
- IBU **23**
- SRM **2.6**
- Style **Grodziskie/Graetzer**

## 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 **4 liter(s) / kg**
- Mash size **13.4 liter(s)**
- Total mash volume **16.8 liter(s)**

## Steps

- Temp **64 C**, Time **50 min**
- Temp **72 C**, Time **15 min**
- Temp **78 C**, Time **1 min**

## Mash step by step

- Heat up **13.4 liter(s)** of strike water to **69.5C**
- Add grains
- Keep mash **50 min** at **64C**
- Keep mash **15 min** at **72C**
- Keep mash **1 min** at **78C**
- Sparge using **15.3 liter(s)** of **76C** water or to achieve **25.3 liter(s)** of wort

## Fermentables

| Type  | Name                               | Amount         | Yield | EBC |
|-------|------------------------------------|----------------|-------|-----|
| Grain | Grodziski pszeniczny wędzony dębem | 1.5 kg (44.8%) | 80 %  | 3   |
| Grain | wędzony                            | 0.6 kg (17.9%) | 82 %  | 4   |
| Grain | Steinbach Wędzony Bukiem           | 0.8 kg (23.9%) | 80 %  | 4   |
| Grain | Bestmalz Wędzony Bukiem            | 0.15 kg (4.5%) | 80 %  | 4   |
| Grain | Weyermann - Grodziski              | 0.3 kg (9%)    | 80 %  | 4   |

## Hops

| Use for             | Name      | Amount | Time   | Alpha acid |
|---------------------|-----------|--------|--------|------------|
| Boil                | Tradition | 20 g   | 60 min | 5.5 %      |
| Aroma (end of boil) | Tradition | 20 g   | 20 min | 5.5 %      |

## Yeasts

| Name                | Type | Form | Amount | Laboratory |
|---------------------|------|------|--------|------------|
| American West Coast | Ale  | Dry  | 11.5 g | Lallemand  |