

## Do trzech razy sztuka

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- Gravity **11.9 BLG**
- ABV **4.8 %**
- IBU **26**
- SRM **29.4**
- Style **Oatmeal Stout**

### Batch size

- Expected quantity of finished beer **17 liter(s)**
- Trub loss **5 %**
- Size with trub loss **17.9 liter(s)**
- Boil time **60 min**
- Evaporation rate **14 %/h**
- Boil size **22.5 liter(s)**

### Mash information

- Mash efficiency **75 %**
- Liquor-to-grist ratio **3 liter(s) / kg**
- Mash size **12.3 liter(s)**
- Total mash volume **16.4 liter(s)**

### Steps

- Temp **67 C**, Time **45 min**
- Temp **78 C**, Time **10 min**

### Mash step by step

- Heat up **12.3 liter(s)** of strike water to **74.8C**
- Add grains
- Keep mash **45 min** at **67C**
- Keep mash **10 min** at **78C**
- Sparge using **14.3 liter(s)** of **76C** water or to achieve **22.5 liter(s)** of wort

### Fermentables

| Type  | Name                        | Amount         | Yield | EBC  |
|-------|-----------------------------|----------------|-------|------|
| Grain | Słód Pale Ale               | 3.2 kg (78%)   | 79 %  | 6    |
| Grain | Słód Carafa Special typ III | 0.2 kg (4.9%)  | --- % | 1400 |
| Grain | Słód Carafa typ I           | 0.2 kg (4.9%)  | --- % | 900  |
| Grain | Płatki owsiane              | 0.5 kg (12.2%) | --- % | 3    |

### Hops

| Use for | Name | Amount | Time   | Alpha acid |
|---------|------|--------|--------|------------|
| Boil    | Zula | 20 g   | 55 min | 7 %        |
| Boil    | Zula | 15 g   | 20 min | 7 %        |

### Yeasts

| Name                       | Type | Form  | Amount | Laboratory |
|----------------------------|------|-------|--------|------------|
| WLP005 - British Ale Yeast | Ale  | Slant | 120 ml | White Labs |

### Extras

| Type   | Name       | Amount | Use for | Time   |
|--------|------------|--------|---------|--------|
| Fining | Whirlflock | 0.5 g  | Boil    | 10 min |

|             |               |     |      |     |
|-------------|---------------|-----|------|-----|
| Water Agent | Węglan wapnia | 4 g | Mash | --- |
|-------------|---------------|-----|------|-----|