

# Świąteczny

- Gravity **14.5 BLG**
- ABV **6 %**
- IBU **26**
- SRM **41.6**
- Style **Oatmeal Stout**

## 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 **70 %**
- Liquor-to-grist ratio **3.5 liter(s) / kg**
- Mash size **22.1 liter(s)**
- Total mash volume **28.4 liter(s)**

## Steps

- Temp **66 C**, Time **60 min**
- Temp **72 C**, Time **30 min**

## Mash step by step

- Heat up **22.1 liter(s)** of strike water to **72.6C**
- Add grains
- Keep mash **60 min** at **66C**
- Keep mash **30 min** at **72C**
- Sparge using **9.5 liter(s)** of **76C** water or to achieve **25.3 liter(s)** of wort

## Fermentables

| Type  | Name                             | Amount         | Yield | EBC  |
|-------|----------------------------------|----------------|-------|------|
| Grain | Viking Pale Ale malt             | 4 kg (63.3%)   | 80 %  | 5    |
| Grain | Jęczmień palony                  | 0.07 kg (1.1%) | 55 %  | 985  |
| Grain | Monachijski                      | 1 kg (15.8%)   | 80 %  | 16   |
| Grain | Strzegom pszenica prażona        | 0.25 kg (4%)   | 70 %  | 1000 |
| Grain | Fawcett - Pszeniczny Czekoladowy | 0.25 kg (4%)   | 73 %  | 1001 |
| Grain | czekoladowy żytni                | 0.25 kg (4%)   | 75 %  | 1000 |
| Grain | karmelowy ciemny                 | 0.5 kg (7.9%)  | 75 %  | 150  |

## Hops

| Use for | Name     | Amount | Time   | Alpha acid |
|---------|----------|--------|--------|------------|
| Boil    | Magnum   | 15 g   | 60 min | 13.5 %     |
| Boil    | puławski | 15 g   | 10 min | 8.9 %      |

## Yeasts

| Name  | Type | Form | Amount | Laboratory |
|-------|------|------|--------|------------|
| US-05 | Ale  | Dry  | 11.5 g | ---        |

## Extras

| Type  | Name               | Amount | Use for   | Time     |
|-------|--------------------|--------|-----------|----------|
| Spice | kardamon           | 3 g    | Boil      | 5 min    |
| Spice | anyż               | 5 g    | Boil      | 5 min    |
| Spice | laska cynamonu     | 2 g    | Secondary | 7 day(s) |
| Spice | laska wanilii      | 2 g    | Secondary | 7 day(s) |
| Spice | goździki           | 5 g    | Boil      | 5 min    |
| Spice | curacao            | 17 g   | Boil      | 5 min    |
| Spice | gałka muszkatołowa | 3 g    | Boil      | 5 min    |

## Notes

- kardamon 3 szt i gałkę muszkatołową zetrzeć goździki i anyż ubić tłuczkiem

laskę wanilii rozciąć wzdłuż i pokroić na mniejsze kawałki, cynamon podzielić  
*Sep 24, 2017, 12:34 PM*