

Kottożytto v2

- Gravity **13.3 BLG**
- ABV **5.5 %**
- IBU **23**
- SRM **9.9**
- Style **Roggenbier**

Batch size

- Expected quantity of finished beer **20 liter(s)**
- Trub loss **10 %**
- Size with trub loss **22 liter(s)**
- Boil time **75 min**
- Evaporation rate **15 %/h**
- Boil size **28.5 liter(s)**

Mash information

- Mash efficiency **80 %**
- Liquor-to-grist ratio **3 liter(s) / kg**
- Mash size **15.8 liter(s)**
- Total mash volume **21 liter(s)**

Steps

- Temp **44 C**, Time **20 min**
- Temp **64 C**, Time **40 min**
- Temp **72 C**, Time **20 min**
- Temp **79 C**, Time **10 min**

Mash step by step

- Heat up **15.8 liter(s)** of strike water to **48C**
- Add grains
- Keep mash **20 min** at **44C**
- Keep mash **40 min** at **64C**
- Keep mash **20 min** at **72C**
- Keep mash **10 min** at **79C**
- Sparge using **18 liter(s)** of **76C** water or to achieve **28.5 liter(s)** of wort

Fermentables

| Type | Name | Amount | Yield | EBC |
|-------|--|-----------------|-------|-----|
| Grain | Weyermann - żytni | 2.5 kg (47.6%) | 81 % | 7 |
| Grain | Weyermann - Pilsner Malt | 1 kg (19%) | 81 % | 5 |
| Grain | Weyermann - Monachijski typ II 20-25 EBC | 1.25 kg (23.8%) | 80 % | 20 |
| Grain | Weyermann - Cararye® żytni karmelowy | 0.5 kg (9.5%) | 70 % | 130 |

Hops

| Use for | Name | Amount | Time | Alpha acid |
|---------------------|---------------------------------|--------|--------|------------|
| Boil | Chmiel Hallertau Tradition (PL) | 40 g | 75 min | 4.5 % |
| Aroma (end of boil) | Chmiel Hallertau Tradition (PL) | 20 g | 10 min | 4.5 % |

Yeasts

| Name | Type | Form | Amount | Laboratory |
|------|------|------|--------|------------|
|------|------|------|--------|------------|

| | | | | |
|--------------------------|-----|-----|--------|--------------------|
| Fermentis Safbrew™ WB-06 | Ale | Dry | 11.5 g | Lesaffre Fermentis |
|--------------------------|-----|-----|--------|--------------------|

Extras

| Type | Name | Amount | Use for | Time |
|-------------------------|----------------|--------|---------|--------|
| Other | Łuska ryżowa | 100 g | Mash | --- |
| Do wspomżenia filtracji | | | | |
| Fining | Mech irlandzki | 5 g | Boil | 10 min |