

# Czekoladowo mleczno owsiany Stout

- Gravity **13.3 BLG**
- ABV ---
- IBU **36**
- SRM **43.5**
- Style **Oatmeal Stout**

## Batch size

- Expected quantity of finished beer **22 liter(s)**
- Trub loss **5 %**
- Size with trub loss **23.1 liter(s)**
- Boil time **60 min**
- Evaporation rate **10 %/h**
- Boil size **27.8 liter(s)**

## Mash information

- Mash efficiency **75 %**
- Liquor-to-grist ratio **3.5 liter(s) / kg**
- Mash size **17.5 liter(s)**
- Total mash volume **22.5 liter(s)**

## Steps

- Temp **66 C**, Time **50 min**
- Temp **72 C**, Time **10 min**
- Temp **76 C**, Time **5 min**

## Mash step by step

- Heat up **17.5 liter(s)** of strike water to **72.6C**
- Add grains
- Keep mash **50 min** at **66C**
- Keep mash **10 min** at **72C**
- Keep mash **5 min** at **76C**
- Sparge using **15.3 liter(s)** of **76C** water or to achieve **27.8 liter(s)** of wort

## Fermentables

Type	Name	Amount	Yield	EBC
Grain	Weyermann - Pale Ale Malt	2.8 kg (53.1%)	85 %	7
Grain	Strzegom Monachijski typ I	0.5 kg (9.5%)	79 %	16
Grain	Strzegom Karmel 30	0.2 kg (3.8%)	75 %	30
Grain	Strzegom Jęczmień palony	0.2 kg (3.8%)	55 %	1100
Grain	Chocolate Malt (UK)	0.3 kg (5.7%)	73 %	887
Grain	Kawowy	0.2 kg (3.8%)	65 %	500
Grain	Oats, Flaked	0.4 kg (7.6%)	80 %	2
Grain	Rye, Flaked	0.4 kg (7.6%)	78.3 %	4
Sugar	Milk Sugar (Lactose)	0.27 kg (5.1%)	76.1 %	0

## Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Marynka	25 g	60 min	10 %
Aroma (end of boil)	Citra	10 g	7 min	12 %
Aroma (end of boil)	Mosaic	20 g	7 min	10 %

## Yeasts

Name	Type	Form	Amount	Laboratory
Wyeast - Irish Ale	Ale	Liquid	200 ml	---

## Extras

Type	Name	Amount	Use for	Time
Fining	Mech Irlandzki	5 g	Boil	15 min
Flavor	Laktoza	700 g	Boil	15 min
Water Agent	gips	5 g	Mash	1 min

## Notes

- Słody ciemne w 50' zacierania  
*Mar 26, 2016, 9:17 AM*