

Piano Black Dry Stout

- Gravity **10.7 BLG**
- ABV ---
- IBU **29**
- SRM **24.6**
- Style **Dry Stout**

Batch size

- Expected quantity of finished beer **27 liter(s)**
- Trub loss **1 %**
- Size with trub loss **27.5 liter(s)**
- Boil time **60 min**
- Evaporation rate **1 %/h**
- Boil size **28.1 liter(s)**

Mash information

- Mash efficiency **85 %**
- Liquor-to-grist ratio **2.4 liter(s) / kg**
- Mash size **11 liter(s)**
- Total mash volume **15.6 liter(s)**

Steps

- Temp **67 C**, Time **60 min**

Mash step by step

- Heat up **11 liter(s)** of strike water to **76.8C**
- Add grains
- Keep mash **60 min** at **67C**
- Sparge using **21.7 liter(s)** of **76C** water or to achieve **28.1 liter(s)** of wort

Fermentables

Type	Name	Amount	Yield	EBC
Grain	Strzegom Pale Ale	4 kg (87%)	79 %	6
Grain	Strzegom Czekoladowy 1200	0.4 kg (8.7%)	68 %	1202
Grain	Karmelowy Czerwony	0.2 kg (4.3%)	75 %	59

Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Iunga	15 g	60 min	11 %
Boil	Sybilla	30 g	20 min	3.5 %
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Yeasts

Name	Type	Form	Amount	Laboratory
Safale S-04	Ale	Dry	11.5 g	Safale