

# Grappa Barleywine

- Gravity **21.6 BLG**
- ABV **9.7 %**
- IBU **50**
- SRM **13.6**
- Style **English Barleywine**

## Batch size

- Expected quantity of finished beer **18 liter(s)**
- Trub loss **10 %**
- Size with trub loss **19.8 liter(s)**
- Boil time **60 min**
- Evaporation rate **17 %/h**
- Boil size **24.7 liter(s)**

## Mash information

- Mash efficiency **65 %**
- Liquor-to-grist ratio **2.7 liter(s) / kg**
- Mash size **21.7 liter(s)**
- Total mash volume **29.7 liter(s)**

## Steps

- Temp **66 C**, Time **120 min**
- Temp **72 C**, Time **15 min**

## Mash step by step

- Heat up **21.7 liter(s)** of strike water to **74.5C**
- Add grains
- Keep mash **120 min** at **66C**
- Keep mash **15 min** at **72C**
- Sparge using **11 liter(s)** of **76C** water or to achieve **24.7 liter(s)** of wort

## Fermentables

Type	Name	Amount	Yield	EBC
Grain	Maris Otter Pale Ale malt	7.32 kg (82.4%)	80 %	5
Grain	Cara Crystal	0.6 kg (6.8%)	70 %	120
Grain	Caraaroma	0.12 kg (1.4%)	78 %	400
Sugar	cukier kandyzowany	0.84 kg (9.5%)	--- %	---

## Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Tomahawk	24 g	70 min	15.5 %
Boil	Tomahawk	18 g	30 min	15.5 %

## Yeasts

Name	Type	Form	Amount	Laboratory
FM52 Amerykański Sen	Ale	Liquid	150 ml	Fermentum Mobile

## Extras

Type	Name	Amount	Use for	Time
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Flavor	Macerowane w grappie płatki dębowe mediummedium	50 g	Secondary	10 day(s)
Flavor	Rodzynki macerowane w grappie	150 g	Secondary	10 day(s)
Fining	mech irlandzki	10 g	Boil	10 min