

# #173 Frau Ribbentrop 2023

- Gravity **12.6 BLG**
- ABV **5.1 %**
- IBU **11**
- SRM **3.3**
- Style **Witbier**

## Batch size

- Expected quantity of finished beer **19.8 liter(s)**
- Trub loss **7 %**
- Size with trub loss **21.2 liter(s)**
- Boil time **60 min**
- Evaporation rate **6 %/h**
- Boil size **22.9 liter(s)**

## Mash information

- Mash efficiency **80 %**
- Liquor-to-grist ratio **2.66 liter(s) / kg**
- Mash size **12 liter(s)**
- Total mash volume **16.5 liter(s)**

## Steps

- Temp **45 C**, Time **10 min**
- Temp **66 C**, Time **60 min**
- Temp **77 C**, Time **1 min**

## Mash step by step

- Heat up **12 liter(s)** of strike water to **49.7C**
- Add grains
- Keep mash **10 min** at **45C**
- Keep mash **60 min** at **66C**
- Keep mash **1 min** at **77C**
- Sparge using **15.4 liter(s)** of **76C** water or to achieve **22.9 liter(s)** of wort

## Fermentables

Type	Name	Amount	Yield	EBC
Grain	Viking pilzneński	2.75 kg (61.1%)	82 %	3.5
Grain	Pszenica niesłodowana	1.5 kg (33.3%)	75 %	3
Grain	Płatki owsiane	0.25 kg (5.6%)	60 %	3

## Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Hallertau Mittelfruh DE 2022 granulát	25 g	70 min	3.1 %
Aroma (end of boil)	Hallertau Mittelfruh DE 2022 granulát	10 g	10 min	3.1 %

## Yeasts

Name	Type	Form	Amount	Laboratory
FM41 Gwoździe i Banany	Wheat	Liquid	40 ml	Fermentum Mobile

## Extras

Type	Name	Amount	Use for	Time
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Flavor	Kwiat gorzkiej pomarańczy	50 g	Boil	1 min
Flavor	Kolendra	20 g	Boil	1 min