

# Mgiełka

- Gravity **12.9 BLG**
- ABV ---
- IBU **49**
- SRM **3.7**
- Style **American IPA**

## Batch size

- Expected quantity of finished beer **24 liter(s)**
- Trub loss **5 %**
- Size with trub loss **25.2 liter(s)**
- Boil time **40 min**
- Evaporation rate **12 %/h**
- Boil size **30.3 liter(s)**

## Mash information

- Mash efficiency **92 %**
- Liquor-to-grist ratio **3 liter(s) / kg**
- Mash size **15.6 liter(s)**
- Total mash volume **20.8 liter(s)**

## Steps

- Temp **55 C**, Time **15 min**
- Temp **63 C**, Time **50 min**
- Temp **72 C**, Time **15 min**
- Temp **76 C**, Time **10 min**

## Mash step by step

- Heat up **15.6 liter(s)** of strike water to **60.8C**
- Add grains
- Keep mash **15 min** at **55C**
- Keep mash **50 min** at **63C**
- Keep mash **15 min** at **72C**
- Keep mash **10 min** at **76C**
- Sparge using **19.9 liter(s)** of **76C** water or to achieve **30.3 liter(s)** of wort

## Fermentables

Type	Name	Amount	Yield	EBC
Grain	Strzegom Pilzneński	3.1 kg (59.5%)	80 %	4
Grain	Viking Golden ale	0.4 kg (7.7%)	80 %	14
Grain	Pszeniczny	0.5 kg (9.6%)	85 %	4
Grain	Żytni Viking Mzlt	0.3 kg (5.8%)	85 %	8
Grain	Słód owsiany Fawcett	0.21 kg (4%)	61 %	5
Grain	Płatki owsiane	0.5 kg (9.6%)	60 %	3
Grain	Viking Malt Enzymatyczny	0.2 kg (3.8%)	82 %	7

## Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Columbus/Tomahawk/Zeus	30 g	30 min	15.5 %
Boil	Amarillo	25 g	15 min	10.1 %
Boil	Amarillo	25 g	5 min	10.1 %
Aroma (end of boil)	Amarillo	25 g	1 min	10.1 %
Aroma (end of boil)	Mosaic	25 g	1 min	11.8 %

Dry Hop	Mosaic	25 g	3 day(s)	11.8 %
Talus CryoHops 25g odpowiada 50g peletu				
Dry Hop	Amarillo	25 g	2 day(s)	10.1 %
Mosaic CryoHops 25g odpowiada 50g peletu				
Dry Hop	Mosaic	50 g	2 day(s)	11.8 %

## Yeasts

Name	Type	Form	Amount	Laboratory
Eitrheim - kveik	Ale	Slant	70 ml	Kveik Yeastery

## Extras

Type	Name	Amount	Use for	Time
Water Agent	Kwas fosforowy	2 g	Mash	90 min
Water Agent	Chlorek wapnia	5 g	Mash	90 min