

# Mango-Marakuja Milkshake IPA

- Gravity **17.1 BLG**
- ABV **7.3 %**
- IBU **29**
- SRM **6.8**

## Batch size

- Expected quantity of finished beer **18 liter(s)**
- Trub loss **5 %**
- Size with trub loss **18.9 liter(s)**
- Boil time **60 min**
- Evaporation rate **12 %/h**
- Boil size **23.6 liter(s)**

## Mash information

- Mash efficiency **75 %**
- Liquor-to-grist ratio **3 liter(s) / kg**
- Mash size **18.9 liter(s)**
- Total mash volume **25.2 liter(s)**

## Steps

- Temp **50 C**, Time **30 min**
- Temp **64 C**, Time **30 min**
- Temp **73 C**, Time **30 min**
- Temp **78 C**, Time **0 min**

## Mash step by step

- Heat up **18.9 liter(s)** of strike water to **55C**
- Add grains
- Keep mash **30 min** at **50C**
- Keep mash **30 min** at **64C**
- Keep mash **30 min** at **73C**
- Keep mash **0 min** at **78C**
- Sparge using **11 liter(s)** of **76C** water or to achieve **23.6 liter(s)** of wort

## Fermentables

Type	Name	Amount	Yield	EBC
Grain	Castle Malting - Pilzniejszy 6-rzędowy	2.5 kg (39.7%)	80 %	5
Grain	Strzegom Pale Ale	2.5 kg (39.7%)	79 %	6
Grain	Płatki owsiane	0.5 kg (7.9%)	85 %	3
Grain	Płatki pszeniczne	0.5 kg (7.9%)	85 %	3
Grain	Strzegom Bursztynowy	0.3 kg (4.8%)	70 %	70

## Hops

Use for	Name	Amount	Time	Alpha acid
Boil	Mosaic	23 g	20 min	10 %
Aroma (end of boil)	Citra	20 g	10 min	12 %
Boil	Cascade	10 g	50 min	6 %

## Yeasts

Name	Type	Form	Amount	Laboratory
Safale US-05	Ale	Dry	11 g	Fermentis

## Extras

Type	Name	Amount	Use for	Time
Flavor	puree z mango	500 g	Secondary	6 day(s)
Flavor	puree z marakuji	500 g	Secondary	6 day(s)