

Milkshake IPA - Mango & Ananas & Papaja

- Gravity **14 BLG**
- ABV **5.8 %**
- IBU **63**
- SRM **5.4**
- Style **American IPA**

Batch size

- Expected quantity of finished beer **10 liter(s)**
- Trub loss **5 %**
- Size with trub loss **11 liter(s)**
- Boil time **60 min**
- Evaporation rate **40 %/h**
- Boil size **16.1 liter(s)**

Mash information

- Mash efficiency **76.5 %**
- Liquor-to-grist ratio **3.5 liter(s) / kg**
- Mash size **9.8 liter(s)**
- Total mash volume **12.6 liter(s)**

Steps

- Temp **67 C**, Time **60 min**
- Temp **78 C**, Time **0 min**

Mash step by step

- Heat up **9.8 liter(s)** of strike water to **73.7C**
- Add grains
- Keep mash **60 min** at **67C**
- Keep mash **0 min** at **78C**
- Sparge using **9.1 liter(s)** of **76C** water or to achieve **16.1 liter(s)** of wort

Fermentables

| Type | Name | Amount | Yield | EBC |
|-------|-----------------------------|----------------|-------|-----|
| Grain | Weyermann - Pale Ale | 1.5 kg (53.6%) | 80 % | 6 |
| Grain | Weyermann - Monachijski I | 0.5 kg (17.9%) | 80 % | 16 |
| Grain | Płatki owsiane błyskawiczne | 0.6 kg (21.4%) | 75 % | 3 |
| Grain | Weyermann - Carapils | 0.2 kg (7.1%) | 75 % | 5 |

Hops

| Use for | Name | Amount | Time | Alpha acid |
|---------|--------------|--------|----------|------------|
| Boil | USA Tomahawk | 10 g | 60 min | 15.8 % |
| Boil | USA Cascade | 25 g | 15 min | 6.8 % |
| Boil | USA Amarillo | 40 g | 5 min | 7.4 % |
| Boil | USA Cascade | 15 g | 0 min | 6.8 % |
| Dry Hop | USA Amarillo | 10 g | 3 day(s) | 7.4 % |
| Dry Hop | USA Cascade | 10 g | 3 day(s) | 6.8 % |

Yeasts

| Name | Type | Form | Amount | Laboratory |
|------|------|------|--------|------------|
|------|------|------|--------|------------|

| | | | | |
|-----------------|-----|-------|-------|-----|
| Safale US-05 II | Ale | Slant | 50 ml | --- |
|-----------------|-----|-------|-------|-----|

Extras

| Type | Name | Amount | Use for | Time |
|--------|--------------------------|--------|-----------|-----------|
| Flavor | Laktoza | 250 g | Boil | 0 min |
| Flavor | Mango, Ananas, Papaja | 900 g | Primary | 10 day(s) |
| Flavor | Wanilia | 1 g | Secondary | 0 day(s) |