

# AMERICAN STOUT

- Gravity **15.7 BLG**
- ABV **6.6 %**
- IBU **51**
- SRM **36.9**
- Style **Dry Stout**

## Batch size

- Expected quantity of finished beer **22 liter(s)**
- Trub loss **5 %**
- Size with trub loss **23.1 liter(s)**
- Boil time **80 min**
- Evaporation rate **10 %/h**
- Boil size **28.7 liter(s)**

## Mash information

- Mash efficiency **67 %**
- Liquor-to-grist ratio **2.6 liter(s) / kg**
- Mash size **19.6 liter(s)**
- Total mash volume **27.2 liter(s)**

## Steps

- Temp **65 C**, Time **80 min**
- Temp **76 C**, Time **10 min**

## Mash step by step

- Heat up **19.6 liter(s)** of strike water to **73.7C**
- Add grains
- Keep mash **80 min** at **65C**
- Keep mash **10 min** at **76C**
- Sparge using **16.7 liter(s)** of **76C** water or to achieve **28.7 liter(s)** of wort

## Fermentables

| Type  | Name                         | Amount          | Yield | EBC  |
|-------|------------------------------|-----------------|-------|------|
| Grain | Monachijski Ciemny Steinbach | 1.25 kg (16.6%) | 100 % | 30   |
| Grain | Pszeniczny                   | 0.25 kg (3.3%)  | 85 %  | 4    |
| Grain | Strzegom Karmel 600          | 0.25 kg (3.3%)  | 68 %  | 601  |
| Grain | Caramunich® typ I            | 0.1 kg (1.3%)   | 73 %  | 80   |
| Grain | Strzegom Barwiący            | 0.1 kg (1.3%)   | 68 %  | 1300 |
| Grain | Weyermann - Carafa I         | 0.1 kg (1.3%)   | 70 %  | 690  |
| Grain | Czekoladowy                  | 0.25 kg (3.3%)  | 60 %  | 788  |
| Grain | Jęczmień palony              | 0.25 kg (3.3%)  | 55 %  | 985  |
| Grain | Pilzneński                   | 5 kg (66.2%)    | 81 %  | 4    |

## Hops

| Use for | Name                   | Amount | Time   | Alpha acid |
|---------|------------------------|--------|--------|------------|
| Boil    | Columbus/Tomahawk/Zeus | 12 g   | 70 min | 15.5 %     |
| Boil    | Citra                  | 17 g   | 40 min | 12 %       |
| Boil    | Simcoe                 | 17 g   | 15 min | 13.2 %     |
| Boil    | Sorachi Ace            | 20 g   | 10 min | 10 %       |

|      |         |      |       |     |
|------|---------|------|-------|-----|
| Boil | Ahtanum | 20 g | 5 min | 5 % |
|------|---------|------|-------|-----|

### Yeasts

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

### Extras

| Type   | Name           | Amount | Use for | Time   |
|--------|----------------|--------|---------|--------|
| Fining | MECH IRLANDZKI | 7 g    | Boil    | 15 min |

### Notes

- 14,2 po gotowaniu, 3blg przy butelkowaniu  
*Feb 4, 2018, 12:26 AM*