

# Black Quad

- Gravity **20 BLG**
- ABV **8.8 %**
- IBU **90**
- SRM **31**
- Style **Black IPA**

## Batch size

- Expected quantity of finished beer **20 liter(s)**
- Trub loss **5 %**
- Size with trub loss **23 liter(s)**
- Boil time **60 min**
- Evaporation rate **10 %/h**
- Boil size **27.5 liter(s)**

## Mash information

- Mash efficiency **70 %**
- Liquor-to-grist ratio **3 liter(s) / kg**
- Mash size **25.5 liter(s)**
- Total mash volume **34 liter(s)**

## Fermentables

Type	Name	Amount	Yield	EBC
Grain	Pilznieński	7.7 kg (84.6%)	81 %	4
Grain	Pszeniczny	0.3 kg (3.3%)	85 %	4
Sugar	Candi Sugar, Clear	0.6 kg (6.6%)	78.3 %	2
Grain	Strzegom Barwiący	0.4 kg (4.4%)	68 %	1300
Grain	Strzegom pszenica prażona	0.1 kg (1.1%)	70 %	1000

## Hops

Use for	Name	Amount	Time	Alpha acid
Dry Hop	Simcoe	100 g	---	13.2 %
Dry Hop	Mosaic	100 g	---	10 %
Aroma (end of boil)	Simcoe	50 g	10 min	13.2 %
Aroma (end of boil)	Mosaic	50 g	10 min	10 %
Boil	Simcoe	50 g	1 min	13.2 %
Boil	Mosaic	50 g	1 min	10 %
Boil	lunga	65 g	60 min	11 %