# **Urbanscape**<sup>®</sup> Green Roll (HTC GR)



Phone: 0468 787 071

#### Description

**Urbanscape**<sup>®</sup> **Green Roll (HTC GR)** is made of long rock mineral wool fibres specially needled to form a compact and dimensionally stable felt.

Product is made solely of virgin rock mineral fibres. Urbanscape<sup>®</sup> Green Roll ensures excellent water retention and conservation in green roofs and is a good growing medium made from various mineral mixtures.



#### Installation

- Roll out Urbanscape<sup>®</sup> Green Roll crosswise on top of the drainage panels/rolls.
- You might create a non covered area from the edge of the roof. This area will be used as a gravel area. Install Urbanscape<sup>®</sup> Green Roll tightly side by side.
- If necessary Urbanscape® Green Roll can be cut to the right size (scissors preferable).

Products	Thickness (mm)	Width (m)	Length (m)	Units per pallet	Weight (kg/m²)	Pallet weight (kg/pallet)	Water retention (I/m <sup>2</sup> )
Green Roll Standard	20	1	6	24	2.20	316.80	17
Green Roll Standard	40	1	З	24	4.40	316.80	29
Green Roll Standard MD	26	1	5	12	3.30	202.80	17
Green Roll Standard HD	26	1	5	12	3.90	234.00	17

Products	Thickness (in)	Width (ft)	Length (ft)	Units per pallet	Weight (lb/ft²)	Pallet weight (lb/pallet)	Water retention (gal/ft²)
Green Roll Standard	0.8	3.28	19.7	24	0.45	698.4	0.417
Green Roll Standard	1.6	3.28	9.8	24	0.90	698.4	0.712
Green Roll Standard MD	1	3.28	16.4	12	0.67	447.1	0.417
Green Roll Standard HD	1	3.28	16.4	12	0.80	515.9	0.417



## **knauf**insulation

#### Technical Properties of Urbanscape® Green Roll

Property	Unit		Value	Standard	
Nominal density*	kg/m³	(lb⁄ft³)	100, 130 (MD), 150 (HD)	6.9, 8.1 (MD), 9.3 (HD)	EN 1602
Initial water absorption**	times		8.3		
Initial water absorption under 700 N/m <sup>2</sup> pressure**	times		7.0		
Water absorption characteristics	Water absorption characteristics %		72		WOK analysis
Thickness tolerance*	T2		EN 14303		
Maximum service temperature*	°C	(°F)	100 (212)		EN 14706
Thermal conductivity at mean temperature* $\lambda$ N,P	W/mK		0.040		EN 12667
Reaction to fire			Euroclass A1		EN 13501-1

\*Valid for dry state \*\*The ratio of the weight of water absorbed by a material, to the weight of the dry material. Certificates : CE, EUCEB, RAL, ISO 9001, ISO 14001, EN 16001, OHSAS 18001

#### Urbanscape® Green Roof System Benefits



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## **KNAUFINSULATION**

## **Urbanscape**<sup>®</sup> Green Flocks

### October 2018

#### Description

**Applications** 

Mixing evenly with soil or any other

growing media improves water

retention capacity and aeration.

**Urbanscape®** Green Flocks are made of needled rock mineral wool. Green Flocks are used as a growing medium for the professional cultivation of plants or as a high quality soil enhancer used to improve soil and save water in a variety of different landscaping applications.

Urbanscape<sup>®</sup> landscaping and landscape-shaping materials are made from natural, locally sourced volcanic rock. Rock mineral fibres are produced in a heating process entirely without any chemical binders and have superior water storage and release properties that make water and nutrients easily accessible to plants. This in turn improves soil structure and reduces environmental stress on plants.

Where to use it

Containers

**Reduced irrigation** 

Landscaping applications (lawn)

areas, slope greening, urban tree

planting, design of shaped patios,...)

#### Why

- Improves soil/substrate characteristics
- Reduces environmental stress on plants
- Plant growth and roots' development
- Produces more vigorous and resistant plants
- Improves soil tilth (soil becomes loose and fluffy)

#### Benefits

High water absorption

Stronger plants





frequency

consumption

Sustainability

**Reduced fertilizer** 



Improved water air ratio

Improved root

growth



## **KNAUF**INSULATION

#### Technical Properties of Urbanscape<sup>®</sup> Green Flocks

Characteristic	Unit	Value
Specific weight	kg/m³ (lb/ft³)	200 (12.5)
Ignition loos	%wt	max. 0.2
Flock size	mm (in)	~20 (~0.8)
Colour		Grey/Green
Initial water absorption*	volume	90%
pH (CaCl <sub>2</sub> )		7.5

Certificates: EUCEB, RAL, ISO 9001, ISO 14001, OHSAS 18001

Mix Green Flocks by hand

or with tools into the

garden or field soil at a

ratio 1 bag at 1m<sup>3</sup> of soil.

Prepare the planting pit.

Mix Green Flocks with

More is better.

the field soil or purpose

substrate at least one bag

per 1 cbm of soil/substrate.

#### Usage / Installation

• Mix with any substrate or other growing media to improve water retention capacity and aeration. Water in the planting container is evenly

Simple to use

distributed and intervals between watering are longer.

• Mix into sandy or loomy soil to improve aeration and water distribution. Water



Recommendations

By adding Urbanscape<sup>®</sup> Green Flocks to the soil you achieve:

- better growing medium characteristics
- less environmental stress on the plants
- better plant growth
- better plant vigour & resistance

watering can be reduced by up to 50%. Results may vary due to the type of soil, vegetation and climatic conditions. It is

Mixing regular soil with Urbanscape®

Green Flocks improves soil structure and

produces higher yields. At the same time

recommended to mix at least 10% of Green Flocks into regular soil or growing substrate. The more Green Flocks are added, the better results are achieved. Especially recommended for outdoor growing.

is easily available for plant uptake.

• We recommend mixing at least 20% of

Green Flocks into the growing medium.

The more you add, the better are results.

#### Packaging of Urbanscape<sup>®</sup> Green Flocks

Product	pallet size (mm)	kg/bag	bags/ pallet	kg/ pallet	pallet/cont (HC 40 ft)	bags/cont (HC 40 ft)	kg/cont (HC 40 ft)	pallet/ truck (13,6 m)	bags/ truck (13,6 m)	kg/truck (13,6 m)
Green Flocks 15kg (469822)	1200 × 1200 × 1400	15	28	420	-	-	-	44	1.232	18.480
Green Flocks 22kg (599273)	1050 × 1050 × 1250	22	12	264	44 (22*)	528 (572*)	11.616 (12.584*)	52	624	13.728
Green Flocks 22kg (615954)	1050 × 1050 × 1250	22	14	308	22*	572*	12.584*	52	728	16.016
Product	pallet size (ft)	lb/bag	bags/ pallet	lb/ pallet	pallet/cont (HC 40 ft)	bags/cont (HC 40 ft)	lb/cont (HC 40 ft)	pallet/ truck (44,6 ft)	bags/ truck (44,6 ft)	lb/truck (44,6 ft)
Product Green Flocks 15kg (469822)	pallet size (ft) 3.9 × 3.9 × 4.6	lb/bag 33.07	bags/ pallet 28	lb/ pallet 926	pallet/cont (HC 40 ft)	bags/cont (HC 40 ft) -	lb/cont (HC 40 ft)	pallet/ truck (44,6 ft) 44	bags/ truck (44,6 ft) 1.232	lb/truck (44,6 ft) 40.741
Product Green Flocks 15kg (469822) Green Flocks 22kg (599273)	pallet size (ft) 3.9 × 3.9 × 4.6 3.5 × 3.5 × 4.1	lb/bag 33.07 48.50	bags/ pallet 28 12	lb/ pallet 926 582	pallet/cont (HC 40 ft) - 44 (22*)	bags/cont (HC 40 ft) - 528 (572*)	lb/cont (HC 40 ft) - 25.609(27.743*)	pallet/ truck (44,6 ft) 44 52	bags/ truck (44,6 ft) 1.232 624	lb/truck (44,6 ft) 40.741 30.265

\*combined loading - 22 pallets of 599273 + 22 pallets of 2615954

## **Urbanscape**<sup>®</sup> **Green** Cubes

### September 2018

#### Description

Urbanscape® Green Cubes are made of needled rock mineral wool. Green Cubes are used as a growing medium for the professional cultivation of plants or as a high quality additive used to improve soil and save water in a variety of different landscaping applications.

Urbanscape® landscaping and landscape-shaping materials are made from natural, locally sourced volcanic rock. Rock mineral fibres are produced in a heating process entirely without any chemical binders and have superior water storage and release capabilities that make water and nutrients easily accessible to plants. This in turn improves soil structure and reduces environmental stress on plants.



#### **Applications**

Mixing evenly with soil or any other growing media improves water retention capacity and aeration.

#### Where to use it

- Landscaping applications (planting pits, garden beds)
- Containers

**Reduced irrigation** 

Pots

#### Why

- Improves soil/substrate characteristics
- Reduces environmental stress on plants
- · Delivers better plant growth and roots' development
- · Produces more vigorous and resistant plants
- Improves soil tilth (soil becomes loose and fluffy)

#### Benefits

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Stronger plants



Efficient installation

frequency



Sustainability

consumption

**Reduced fertilizer** 



Improved water air ratio

Improved root

arowth



**KNAUFINSULATION** 

#### Technical Properties of Urbanscape® Green Cubes

Characteristic	Unit	Value	Standard
Specific weight	kg/m³ (lb/ft³)	110 (6.87)	
Ignition loos	%wt	max. 0.2	6
Fibre diameter	μm (µin)	approx. 4.5 (177)	SK_109
Cube size	mm (in)	20×20×20 (0.8×0.8×0.8)	
Colour		Grey/Green	
pH (CaCl <sub>2</sub> )		7.5	
Initial water absorption*	times	7	

\*The ratio of the weight of water absorbed by a material to the weight of the dry material. Certificates: EUCEB, RAL, ISO 9001, ISO 14001, OHSAS 18001

#### Usage / Installation

 Mix with any substrate or other growing media to improve water retention capacity and aeration. Water in the planting container is evenly distributed and

Simple to use

intervals between watering are longer.

- Mix into sandy or loamy soil to improve soil aeration and water distribution.
  Water is easily available for plant uptake.
- **2** Usual care **3**. Less watering Place the mixture in a Green Cubes retain pot. Place the plant additional water so in the ready-made that the plant may mixture and water access it as required. thoroughly. The cubes should be covered with soil. Plant shrubs and trees, cover all exposed roots with Green Cubes retain the mixture and water well. Cubes should be additional water thus covered with the layer that the shrubs and of soil to prevent the trees may access it as evaporation. required.

#### to 50%. Results may vary due to the type of soil, vegetation and climatic conditions. It is recommended to mix at least 20% of Green Cubes into regular soil or substrate. The more cubes you add, the better results are achieved.

We recommend mixing at least 20% of

• The more you add, the better results

are achieved.

Green Cubes into the growing medium.

#### Prepare the planting pit. Mix Green Cubes with the field soil or purpose substrateat a ratio of

substrateat a ratio of 1:5 (1/5 cubes mixed with 4/5 substrate).

Mix Green Cubes with the

substrate at a ratio of 1:5

(1/5 cubes with 4/5 sub-

strate). The proportion of

cubes can be increased when planting plants

with more demanding water requirements.

### Recommendations

By adding the Urbanscape Green Cubes to the soil you achieve:

- better growing medium characteristics
- less environmental stress on the plants
- better plant growth
- better plant vigour & resistance

## Especially recommended for outdoor growing.

Mixing regular soil with Urbanscape Green Cubes improves soil structure and produces higher yields. At the same time watering frequency can be reduced by up

Packaging of Urbanscape® Green Cubes

Product	pallet size	weight/pallet	pallet/cont (HC 40ft)	Btto weight /cont (HC 40ft)	pallet/truck (44.6ft)	Btto weight/ truck (44.6ft)
Groop Cubos D11 (435.445)	1280 × 1040 × 1250 mm	125 kg	40	5.000 kg	46	5.750 kg
Green Cubes D11 (425445)	4.2 × 3.4 × 4.1 ft	275 lb	40	11.023 lb	46	12.676 lb

\*Also available in retail packaging