

## Brick HVLS Ceiling Fans – Gear Motor Solution

### Exciting Innovations

#### Al-Pc Complex Blade

Two materials compose blade.  
Shell by engineering plastic,  
Skeleton by aluminum tube  
Total weight reduces 40%  
No blade resonance.  
Energy saving.

#### Blade Interconnect Grille

A nylon cord interconnects every blade in turn to form a floating ring.  
3-5 rings along the radial which tie  
All blades build a protection grille to hold any free-fall blade.

#### Skeleton Interconnect Ring

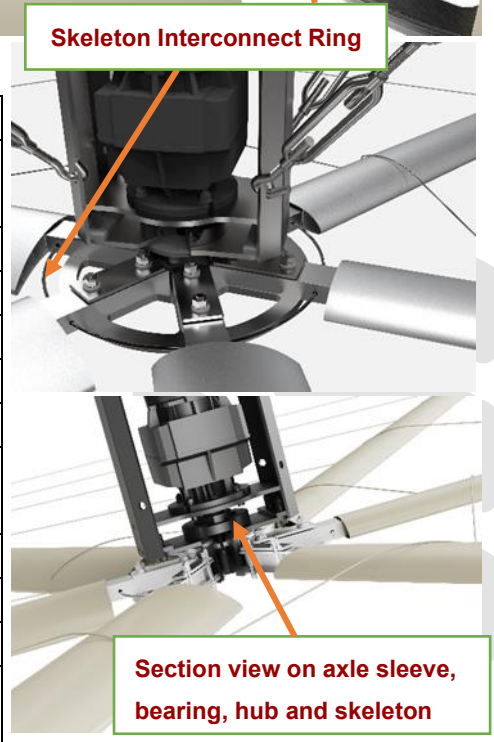
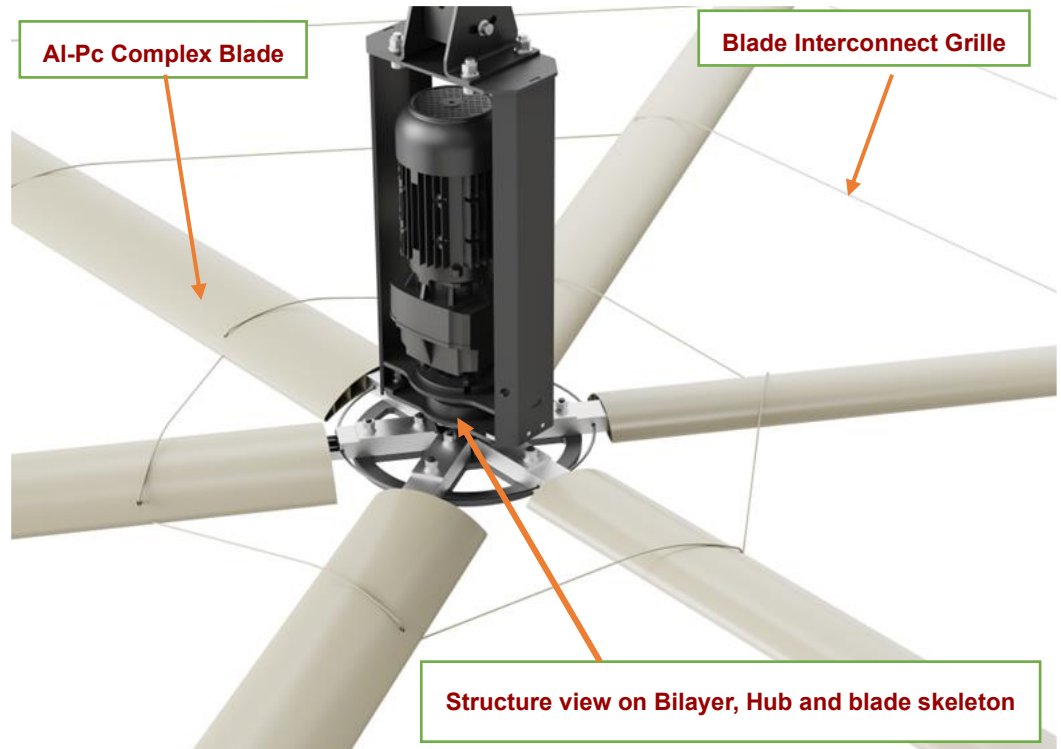
A cord connects all blade skeletons to form a ring prevent any blade from flyoff

#### Bilayer Deck on Motor Rack

only for gear motor.  
upper deck function is same as existing motor rack.  
Bottom deck sets a bearing to hold weight load of the blades and hub, also part disturbing force from blades.  
Minimize gear box load and noise, prolong service life.  
An anti-fall plate set underneath bottom deck, the role is equivalent to Anti-Fall Hook.  
Two circlips set at bottom end of motor axle and top end of bearing cover, also anti-fall function of hub.

### Spec./Model/Param/Config

Items	Detail Descriptions					
Product Model	BRK-HD5-1.1/D**					
BRK-HG6 Series	-/D24	-/D20	-/D18	-/D16	-/D14	-/D12
Diameters mm	7300,	6100,	5500,	4900,	4300,	3700
Max. rpm	50	60	70	75	85	95
Air Circulating m <sup>3</sup> /m	13500,	12150,	11750,	11250,	10800,	10350
Extend Reach m <sup>2</sup>	1400,	1050,	855,	670,	520,	380
Hanging weight kg	125	120	115	110	105	100
Gear Motor	1.5 kw / BRK Custom-made, Nord ARM motor option				1.1kw	
Power Data	380V/3P or 220V/1P, 50-60 Hz					
Control Panel	BRK Custom-made, stepless speed regulation					
Motor Rack + Hub	Blade skeletons directly fixed on upper cover of the motor					
Blade & safety advice	6 blades /188mm width, <u>Al-Pc Complex Blade</u> + <u>Blade Interconnect Grille</u>					



**Superiorities of Al-Pc Complex Blade**

- Plastic material needs lower melting temperature in extrude process, consume less energy.
- reduce 40% in weight compare to aluminum blade, save driven power, cut down skeleton load and minimize metal fatigue, prolong service life.
- Two materials compose blade, plastic contour and aluminum skeleton, the blade will not resonate. Most of broken blades were caused by metal fatigue at root position.
- No resonance plus lightweight will generate higher rpm, faster ground airflow and larger extend reach by equivalent power.
- Easy clean, no water stain left after water clean.
- blade color optional for long term buyers or large order.
- Blade Interconnect Grille will prevent blade from free fall, which substantially upgrade the Safety and reliability criteria in industry.
- Nylon cord of Grille is light and easy to knit, decrease the load and Installation time.

**Reliability and quality of Al-Pc complex Blade**

- Main ingredient of blade contour is polycarbonate (PC), it is an engineering plastic of high performance-price ratio.
- PC is widely applied in mechanical and optics industry since its outstanding features in mechanical, heat-resisting, and anti-aging. such as glass window on aircraft, gear and crank axle on machine etc.
- Service life of PC is over ten years in interior application.
- Skeleton undertake strength and rigidity of blade on radial. it made of extrude aluminum, exactly same with aluminum blade. Compared with the latter, Curve down phenomenon on blade will ease in years application as skeleton bear less load, cantilever load also decline. Working condition of skeleton is better than aluminum blade
- The blade strength of transverse section partly be undertaken by PC, 4 vertical stiffeners in inner cavity are set to ensure the contour no twisted, deformed or broken.
- Durability and reliability of Al-Pc Complex blade is superior to aluminum blade.

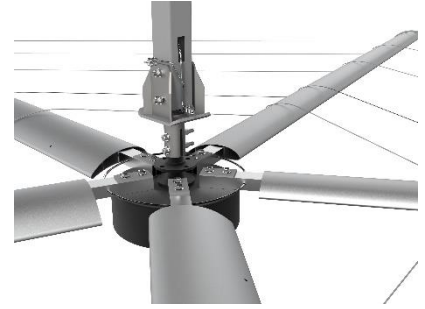
**Brief Introduction to Brick**

- First branded OEM manufacturer in industry, dedicated to R&D and manufacturing.
- Distributor and agent focus on site service, backed by Brick.
- Brick mission is to promote new technology and products, upgrade safety and reliability criteria substantially.
- Technologies such as Al-Pc Complex Blade + Blade Interconnect Grille + bilayer Motor rack + Skeleton Interconnect Ring for HVLS Ceiling Fans, and Segment Structure + Ladder Shaped Flank Grille for portable fans etc. they are all originally and initially invented by Brick, which innovatively improve or substantially resolve the existing problems, related to safety and reliability.
- Initially launch Concentrated or Broad Airflow Blade on portable and Pivot Fans
- Initially launch Dock Fans of jet stream for long trailer, first supplier in industry to focus on improvement of muggy environment inside container.
- All those innovative technologies have applied patents.

**Distributor Information**

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**Other innovative products**



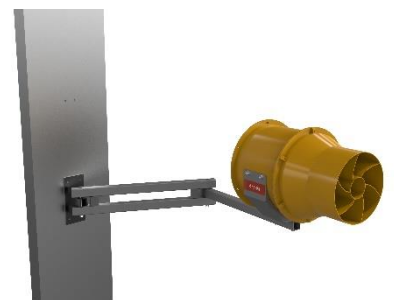
**HVLS Fans by PMSM motor**



**Portable Fans**



**Comm. Ceiling Fans**



**Dock Fans**



**Pivot Fans**