

N-type Wafer

Over 20 years of dedication to the N-type, Full-size customisable

QUALITY SYSTEM

ISO 9001 ISO 14001

ISO 45001 ISO 50001 GB/T29490

Pioneer in China solar monocrystalline field

Excellence for Centuries, Partnering with Heart

Geometry

Property	Index						Testing Tools	Inspection Method
Silicon wafer model	182.2*183.75	182.3*210	182.55*210.25	210*105	210*210	218.2*218.2		
Wafer Side Length (mm)	182.2±0.25 183.75±0.25	182.3±0.25 210±0.25	182.55±0.25 210.25±0.25	210±0.25	210±0.25	218.2±0.25	Automatic Sorting Machine	Wafer Inspection System
Wafer Diameter (mm)	256±0.25	272±0.25	276±0.25	295±0.25	295±0.25	306.6±0.25		
Angle Etween Adjacent Sides (mm)	90° ± 0.12°							
Thickness	Batch Ave : ≥ Thickness Thickness (90/110/130/150μm) Uniwafer Ave : Thickness±8μm							
TTV(Total Thickness Variation)	≤ 20 μm							

Material Properties

Property	Index						Testing Tools	Inspection Method
Silicon wafer model	210*210	182.3*210	182.2*183.75	210*105	182.55*210.25	218.2*218.2		
Oxygen Concentration[O _i]	≤ 11 ppma						6700-FTIR Transform Infrared Spectrometer	GBT 1557-2006
Carbon Concentration[C _s]	≤ 1 ppma							GBT 1558-2009
Etch Pit Density(Dislocation Density)	≤ 500cm ⁻²						Surface Defect Inspection Lamp	Preferential Etch Tehniques (ASTM F47-88)
Surface Orientation	< 100 > ± 3°						X-ray Diffraction Methode(ASTM F26-1987)	GBT 1555-1997
Resistivity	0.6 ~ 1.6 Ω·cm						Automatic Sorting Machine	Wafer Inspection System
Minority Carrier Lifetime	≥ 1000 μs						Analyzer BCT-40	Transient

Surface Properties

Property	Index						Testing Tools	Inspection Method
Silicon wafer model	210*210	182.3*210	182.2*183.75	210*105	182.55*210.25	218.2*218.2		
Surface Quality	No stain ; No Breakages,Pin-holes and impurities ; No scratch;No scratch on the edge						Automatic Sorting Machine	Wafer Inspection System
Saw Marks	Saw marks≤13 μm ;							
Bow	≤40 μm							
Chip	Depth ≤ 0.3mm *Length ≤0.5mm. Max≤ 1 / pcs , NoV-Chip				Not allowed			
Bright Edge	Not allowed							
Micro Cracks	Not allowed							
Holes	Not allowed							

