



6-IN-1 PULSE LASER - OVERVIEW



6-IN-1 DESIGN

6-IN-1 LASER SYSTEM – MORE THAN CLEANING!
COMBINES CLEANING, MARKING, ENGRAVING, COLOR
PRINTING, CUTTING & WELDING IN ONE COMPACT
MACHINE FOR ULTIMATE VERSATILITY AND EFFICIENCY.



100+ PARAMETER PRESETS

PROBEAM LASER CLEANING SOFTWARE COMES
PRELOADED WITH 100+ READY-TO-USE PARAMETER
PRESETS, CAREFULLY OPTIMIZED FOR VARIOUS
CONTAMINANTS (RUST, PAINT, OIL, ETC.) AND BASE
MATERIALS (STEEL, ALUMINUM, COPPER, ETC.). THESE
INTELLIGENT PRESETS ELIMINATE GUESSWORK – SIMPLY
SELECT YOUR COMBINATION OF CONTAMINANT AND
SUBSTRATE, AND THE SOFTWARE AUTOMATICALLY
APPLIES THE IDEAL LASER PARAMETERS FOR PERFECT
CLEANING RESULTS.



100,000 HOUR LIFESPAN

PROBEAM LASERS ARE ENGINEERED FOR EXCEPTIONAL
DURABILITY, WITH A LIFESPAN OF UP TO 100,000
WORKING HOURS
EQUIVALENT TO 11.5 YEARS OF CONTINUOUS 24/7
OPERATION. THANKS TO OUR ADVANCED LASER
DESIGN, THE POWER DEGRADATION RATE IS EXTREMELY
SLOW, ENSURING STABLE PERFORMANCE
THROUGHOUT ITS EXTENDED SERVICE LIFE.



6-IN-1 PULSE LASER – COMPARISON CHART

LITE VS PRO VS ULTRA			
Version	LITE	PRO	ULTRA
6 in 1	No	Yes	Yes
Backpack / Luggage	Luggage	Backpack + Luggage	Backpack + Luggage
Desktop / Handheld	Handheld	Handheld + Desktop	Handheld + Desktop
Fiber Cable Length	3M	3/5M Optional	3/5M Optional
Focus Guider	Included	Included	Included
Safety Goggle	1 Set	2 Set	3 Set
Warranty	2 Year	2.5 Year	3 Year
Software Update	1 Year	3 Year	Lifetime
Lead Time	3-5 Days	1-3 Days	In Stock





6-IN-1 PULSE LASER – CLEANING PATTERNS

CLEANING PATTERNS

PROBEAM PROVIDES 11 PRESET CLEANING MODES PLUS FULLY CUSTOMIZABLE DESIGNS. IMPORT ANY GRAPHIC OR CREATE YOUR OWN FOR LIMITLESS CLEANING POSSIBILITIES.



**11+X Unlimited
Cleaning Patterns**



[Unlimited Text Patterns]



[Unlimited Graphic Patterns]





6-IN-1 PULSE LASER – LASER VS OTHER TECH.

LASER VS OTHER TECHNOLOGIES

NO CONTACT & NO DAMAGE

Safely and gently clean even the most delicate surfaces without any physical contact, eliminating risk of scratches, abrasion, or surface damage.

NO CHEMICAL & NO CONSUMABLES

Completely eliminate rust, paint, and contaminants without using any harsh chemicals, abrasive media, or disposable consumables for truly eco-friendly cleaning.

PRECISION & SELECTIVE CLEANING

Remove unwanted layers with micron-level precision and complete control, targeting only contaminants while perfectly preserving the underlying base material.

UP TO 100,000 HOURS LIFESPAN

Experience exceptional durability and reliability with industrial-grade components engineered to deliver maximum uptime and minimal maintenance over years of heavy use.

Aspect	Laser Cleaning	Traditional Cleaning (Chemical/Mechanical/Sandblasting)
Method	No touch – uses laser to remove dirt	Uses chemicals, scrubbing, or sandblasting
Damage Risk	Almost none (99% safe for surfaces)	Can scratch, crack, or corrode materials
Speed	Fast	Slow
Supplies Needed	Only electricity (no extra costs)	Needs chemicals, abrasives, or solvents (expensive over time)
Cleaning Quality	Very precise (removes only what's needed)	Uneven cleaning, may leave residue
Precision	Works on tiny areas (<0.1 mm accuracy)	Less precise, often over/under-cleaned
Eco-Friendly	No waste, 80% less CO ₂ , safe for the environment	Creates chemical waste, dust, and pollution
Safety	Quiet (60–70 dB), no toxic chemicals	Harmful fumes, dust, and chemical risks
Automation	Easy to automate with robots	Mostly manual work, hard to automate
Upfront Cost	Higher initial cost	Cheaper at first but more expenses later
Long-Term Cost	70% cheaper (no maintenance & 100,000-hour lifespan)	High yearly costs (e.g., \$30K–50K for chemicals)



6-IN-1 PULSE LASER – ADJUSTABLE SPEEDS

1-3000HZ ADJUSTABLE FREQUENCY

PROBEAM UTILIZES ADVANCED MOPA PULSED FIBER LASER TECHNOLOGY, OFFERING A WIDE ADJUSTABLE FREQUENCY RANGE OF 1–4000KHZ—FAR SURPASSING THE LIMITED 1–5KHZ OF CONTINUOUS LASERS AND THE FIXED 100–200KHZ OF NON-MOPA PULSED LASERS. THIS HIGH FLEXIBILITY ENSURES OPTIMAL CLEANING PERFORMANCE ACROSS A BROAD SPECTRUM OF MATERIALS AND CONTAMINANTS.

15-500NS ADJUSTABLE PULSE WIDTH

PROBEAM LEVERAGES STATE-OF-THE-ART MOPA PULSED FIBER LASER TECHNOLOGY, SETTING IT APART FROM CONTINUOUS LASERS (WITH NO PULSE WIDTH CONTROL) AND NON-MOPA PULSED LASERS (WITH FIXED PULSE WIDTHS). OUR ADVANCED MOPA SYSTEM OFFERS AN EXCEPTIONALLY ADJUSTABLE PULSE WIDTH RANGE OF 2–500NS, ENABLING PRECISE, HIGH-SPEED CLEANING ACROSS A WIDE VARIETY OF SUBSTRATES.

GAUSSIAN AND TOP HAT BEAM PROFILE OPTIONS

PROBEAM OFFERS STATE-OF-THE-ART TOP-HAT BEAM PROFILE OPTIONS, PROVIDING OPTIMAL FLEXIBILITY FOR DIFFERENT CLEANING APPLICATIONS. THE GAUSSIAN BEAM DELIVERS HIGHER PEAK INTENSITY AT ITS CENTER, MAKING IT IDEAL FOR REMOVING HIGH-THRESHOLD CONTAMINANTS LIKE THICK PAINT AND RUST WITH FOCUSED ENERGY. IN CONTRAST, THE TOP-HAT BEAM ENSURES UNIFORM ENERGY DISTRIBUTION ACROSS THE ENTIRE SPOT, ACHIEVING CONSISTENT CLEANING RESULTS—THOUGH IT MAY REQUIRE HIGHER POWER FOR TOUGH CONTAMINANTS.

FOR 100W AND 200W LASERS, WE DEFAULT TO GAUSSIAN BEAM FOR EFFICIENT HIGH-INTENSITY CLEANING, WHILE 300W LASERS COME STANDARD WITH TOP-HAT BEAM FOR SUPERIOR UNIFORMITY. IF YOUR APPLICATION REQUIRES A CUSTOM BEAM PROFILE, OUR TECHNICAL TEAM CAN TAILOR THE SOLUTION TO YOUR NEEDS.