



## RAM AIRCRAFT, LP

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**ENGINES • PARTS • PROPELLERS • ACCESSORIES • STC'S**

### Cessna 414

#### RAM Overhaul & Improvement Package ( R.O.I. ) - Series IV

##### Two Engines - OHE TCM TSIO-520-NB

- |  |   |
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| <ul style="list-style-type: none"> <li>• Horsepower - 325 hp</li> <li>• TBO - 1600 hrs.</li> <li>• Cylinders - NE<br/>[ RAM <i>Nickel New</i> Cylinder Package ]</li> <li>• Crankcase - heavy style case - OHE<br/>[ with 7th studs on cylinder bases ]</li> <li>• Crankshaft - OHE</li> <li>• Camshaft - RAM high efficiency</li> <li>• Alternator - OHE<br/>[ reuse serviceable clutch ]</li> <li>• Starter and starter drive - OHE</li> <li>• Magnetos - Champion Slick 6320 - NE<br/>[ pressurized ]</li> <li>• Spark plugs - new</li> <li>• Magneto harness - Champion - new</li> <li>• Fuel injection system - OHE</li> <li>• Turbocharger - OHE</li> <li>• Turbo controller - OHE</li> <li>• Overboost relief valve - OHE</li> <li>• Intercooler - exchange<br/>[ inspect and repair ]</li> <li>• Induction couplings - RAM - new</li> <li>• Induction flex elbows - RAM - new</li> </ul> | <ul style="list-style-type: none"> <li>• Air filter - RAM - new</li> <li>• Metal baffles - exchange<br/>[ refurbished and painted ]</li> <li>• Baffle Seals - new<br/>[ RAM <i>SureStand</i> red silicone rubber ]</li> <li>• Cooling shroud - RAM - new<br/>[ for dry vacuum pump ]</li> <li>• Oil cooler - NE</li> <li>• Air / oil separator - exchange<br/>[ inspected and repaired ]</li> <li>• Breather, rod and cap - OHE<br/>[ Stainless Steel ]</li> <li>• Precision balance - exchange<br/>[ crankshaft and rod sets ]</li> <li>• Core Return Policy - See:<br/><a href="#">RAM OHE TCM TSIO-520 Engine Overhaul Specifications.</a></li> <li>• Also see:<br/><a href="#">RAM Value Options &amp; Compliance Items.</a></li> </ul> |
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OHE = Overhauled Exchange  
 NE = New Exchange - OEM or PMA  
 New = New Outright - OEM or PMA  
 New Items = Subject to test time,  
 ferry time and inventory time.

##### Installation Parts - Included

- Wastegates and actuators - RAM - OHE
- Engine shock mounts - new
- Exhaust slip-joints - PMA - new
- Primary fuel and oil hose kits - heavy duty - *Teflon*<sup>TM</sup> - new

## Upgrade Kit - Included - RAM IV

- Hartzell *ScimitarPlus* Propellers - NE  
[ New technology FC7693 Blended Airfoil Blades ]
- New 1-piece D-7267-2P polished spinner and new bulkhead - NE  
[ Includes new de-ice boots. ] [ The slip ring is refurbished - exchange ]
- McCauley MC-1 Governors - exchange
- Propeller Electronic Synchrophaser Control Box - RAM RPS2000 - new
- Shadin Digiflo-L Electronic Fuel Management - new  
[ without RAM connecting the avionics interface ]
- EGT gauge range marked - new  
[ with probes - new ] [ Leads as required. ]
- Tach, MP and 3-in-1 engine gauges - check calibration and range mark
- Serviceable ( non-TAS ) airspeed indicators - remarked  
[ If TAS indicator is currently installed, consult your RAM representative. ]
- Gross Weight Increase STC and Flight Manual Supplement  
[ + 160 lbs. Useful load ] [ GW 6,350 lbs. up to 6,510 lbs. ] [ Ramp Wt. to 6,550 lbs. ]

## Installation and Set-up

- Each aircraft receives a detailed preflight and flight inspection to ensure airworthiness and to document performance of instruments, flight controls, landing gear, accessories, lights, and avionics.
- Discrepancies are brought to customer's attention. Unairworthy items must be repaired at customer's expense during RAM proceedings in order for RAM to set up, fly, and deliver the finished product.
- Old engines are removed. Engine beds are cleaned. Mount structures are inspected and corrosion treated. Four hours labor per engine is standard.
- Due to its tendency to contaminate the engine oil supply, if installed, the propeller unfeathering accumulators will be disabled unless optionally replaced with a newer unit. OHE: \$875 / each
- Applicable RAM R.O.I. Installation Parts and Upgrade Kit are installed.
- Engines installed and set up, involving multiple flights and fuel.
- Aircraft washed. Interior cleaned prior to delivery and customer acceptance.

## Prop Option

- New McCauley C-515 *Sabre Tip* propellers - NE: Add additional \$6,060 to package cost.  
[ Substitution In lieu of new Hartzell Propellers ]  
[ Includes de-ice boots - New ]  
[ without new spinner & bulkheads - reuse customer's ]

## Cessna 414 - Series IV

### RAM Complete ( R.O.I. ) Package: \$121,270

Installed at RAM - exchange

- **RAM OHE TCM TSIO-520-NB - 325 hp engines**
- **Installation Parts - Included**
- **Installation and Set-up**
- **Upgrade kit - Series IV**