AFT
AIR FUSION TECHNOLOGY
Product Overview
Schroeder’s Air Fusion Technology – Next Generation Tank optimization

40 gpm (151 L/min) | 100 psi (7 bar)

Tank Optimization Goal:

- Maximize the dwell time of the fluid in the tank for optimal de-aeration of the return fluid
- Minimize the total fluid in the tank to meet optimal operation functionality defined by our customer’s parameters.

Through CFD analyses we can provide our customers with real world data on flow, de-aeration, sloshing, thermal and structural characteristics.

AFT + TNK = Complete Tank Optimization Solutions

MAXIMIZE the potential of your hydraulic system utilizing our next generation filters and our HIGH STRENGTH, and LIGHT WEIGHT composite reservoirs!

Schroeder offers all your RESERVOIR ACCESSORIES from breathers to strainers to fluid level gauges. No matter the application, Schroeder has a hydraulic solution for you!
How does Air Fusion Technology compare against the traditional return line filter?

The AFT can provide up to a **60% decrease in reservoir size** with a up to a **30% increase in deaeration performance**

<table>
<thead>
<tr>
<th>Air Bubble Size</th>
<th>Standard Return Line</th>
<th>AFT Return Line</th>
<th>AFT Performance Increase</th>
</tr>
</thead>
<tbody>
<tr>
<td>1 mm</td>
<td>28%</td>
<td>65%</td>
<td>37%</td>
</tr>
<tr>
<td>2 mm</td>
<td>64%</td>
<td>99%</td>
<td>35%</td>
</tr>
<tr>
<td>3 mm</td>
<td>83%</td>
<td>100%</td>
<td>17%</td>
</tr>
</tbody>
</table>

- Radial exit velocity with exceptional air bubble coalescing
- Unconventional flow path design to smoothly remove air from the fluid
- Significant dwell time in a smaller space
- Laminar Flow = No Sloshing

20% LESS AIR IN SUCTION STRAINER WITH AFT
AFT is Coalescing Savings for You!

When reducing the tank size, you also need to consider the savings back into your pocket! With a project where we reduced a 9-gallon reservoir to a 2-gallon reservoir, over a 10 year span we can save our customer up to $750,000! This assumes an annual usage of 400 units.

Benefits of reducing tank size:

- Shortens the time to get to operating temperature by about 15 minutes, this is **15 minutes less time in cold start by-pass!**
- Smaller tank creates space for new features that could be more appealing to the end user, like a larger toolbox, a larger fuel tank, additional features to give them a step forward in the marketplace.

**OVER $750K TOTAL SAVINGS!**

Customer Projected Savings over the next 10 Years from a 9-Gallon Tank to a 2-Gallon Tank

<table>
<thead>
<tr>
<th>Year</th>
<th>Labor</th>
<th>Steel</th>
<th>Hydraulic Fluid</th>
<th>Total Savings</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>$20,040</td>
<td>$24,741</td>
<td>$30,800</td>
<td>$75,581</td>
</tr>
<tr>
<td>5</td>
<td>$100,200</td>
<td>$123,703</td>
<td>$154,000</td>
<td>$377,903</td>
</tr>
<tr>
<td>10</td>
<td>$200,400</td>
<td>$247,406</td>
<td>$308,000</td>
<td>$755,806</td>
</tr>
</tbody>
</table>

7 gallons less hydraulic oil required for your machine decreases the amount of carbon dioxide emitted from hydraulic oil production by 165 lbs/CO2 per machine. Our Optimization with Next Gen Filtration will reduce your carbon footprint over the year by 66,000 lbs of carbon dioxide per year!