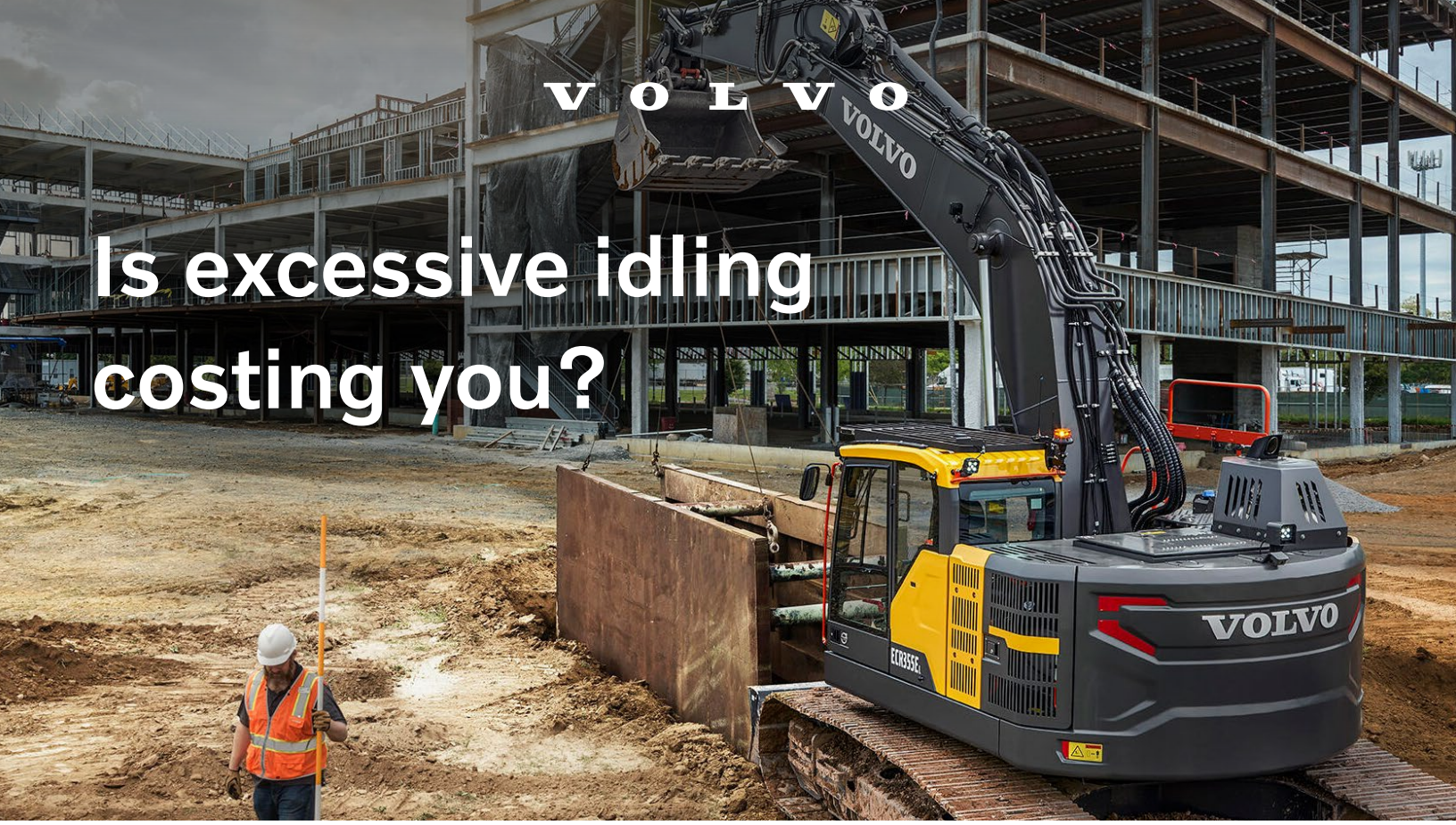

Is excessive idling costing you?

Many machines will idle for as much as 40 to 60% of their operating time. And while some idling is necessary, be aware that excessive idling can become a costly habit.

WHAT YOU CAN DO

- ✔ **Warm up under load:** Try to avoid extended idling during warm-up. Instead, allow your machine to warm up by gradually increasing the load during the first few minutes of operation. This helps the engine reach its optimal operating temperature more efficiently.
- ✔ **Set an idle time limit and use an automatic engine shutoff:** If your machine has these features, use them. They'll reduce engine speeds or even shut it off when your machine is inactive for a preset amount of time.
- ✔ **Avoid idling for temperature control:** Instead of running the engine solely to control cab temperature, equip machines with auxiliary power units (APUs) or use battery-powered climate control systems.
- ✔ **Use telematics programs:** These systems can track and report on idle times so you can make proactive changes to try and cut back.
- ✔ **Keep filters clean:** Regular maintenance, including changing air and fuel filters, ensures that idling periods cause less damage, as the engine will perform more efficiently.
- ✔ **Be sure everyone understands the impacts of idling:** Ensure all of your operators are trained on the impacts of excessive idling. Reinforce the importance of shutting down engines when their equipment isn't in use.
- ✔ **Reduce warm-up idling in cold weather:** Use block heaters to pre-warm the engine coolant, reducing the need for extended idling.
- ✔ **In colder climates, use a low-temperature diesel:** Use winter-grade diesel or fuel additives that prevent gelling, reducing the need for long warm-up idling.
- ✔ **Cool down after heavy use:** Before shutting off the engine, you'll still want to allow your machine to idle for 3-5 minutes to cool down the turbocharger to prevent overheating.

What happens if I idle too much?

THE IMPACTS

- ✔ **Carbon Buildup:** Prolonged idling can lead to incomplete combustion, causing carbon build-up in your engine. Over time, this can reduce performance and efficiency.
- ✔ **Fuel Contamination:** When a diesel engine idles too long, it doesn't reach its optimal operating temperature. This can cause unburned fuel to dilute the engine oil, increasing component wear and tear.
- ✔ **Increased Engine Wear:** Diesel engines are designed to operate under load. Idling can create conditions of low cylinder pressure and reduced lubrication which can also lead to unnecessary wear and tear.
- ✔ **Increased Fuel Consumption:** Unnecessary idling wastes fuel without doing any productive work. That hurts your operating costs.
- ✔ **Emissions and Environmental Impact:** Idling increases harmful emissions such as nitrogen oxides (NOx) and particulate matter.