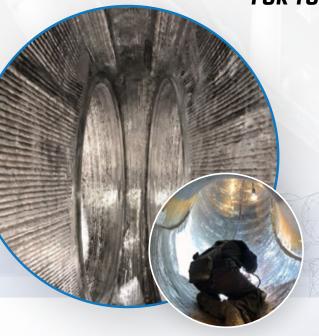


# THE ULTIMATE DEFENSE

FOR YOUR MOST CRITICAL ASSETS



#### We develop innovative asset protection solutions

that are purposefully built and patented to shield against corrosion and abrasion challenges. In addition, our custom solutions extend the service life of your hardest-working assets so that you can maximize your cost savings and uptime.

# ASSETARMOR\*

# **OUR LEGACY**

**AssetArmor™** is the ultimate defense that your critical assets need to stand the test of time - even in the most hostile environments.

As one of the largest weld overlay solution companies in North America, our experience and expertise in manufacturing dependable asset protection products stand the test of time. Our commitment to innovation through our research and development program and our lab testing facility has driven us to continuously improve and develop new products that has forged the AssetArmor product family.

# **OUR COMMITMENT**

**AssetArmor™** has been developed with a long-term commitment to quality. Our overlay divisions are proud holders of ASME U, ASME U2, ASME S, ABSA and CWB certification. This long-term relationship with regulatory bodies allows the AssetArmor product line to provide a wide range of product offerings from the supply code-compliant pressure equipment to subcontract welding on free-issue standard material.

#### **OUR CERTIFICATION**













# **DEFENDING AND EXTENDING** THE LIFE OF YOUR MOST **CRITICAL ASSETS.**

This product line has been designed for various asset arrangements and sizes, with the ability to service a wide variety of markets and specifications across the globe. Our suite of products and expertise are why AssetArmor<sup>™</sup> continues to be an Industry preferred partner. Forging trusted relationships with a customer-first approach ensures we deliver reliable asset protection at the right price.



#### **Chromium Carbide Overlay**

Designed to withstand even the most hostile environments.



#### **Chrome White Iron**

Superior abrasion-resistant sleeves to increase your operational time and serviceability advantage.



#### **Corrosion Resistant Alloys**

Over 300 material and overlay weld procedure combinations to work with.



# **Asset Integrity Monitoring**

See early detection of declining asset integrity and protection performance in real-time.



#### **Tungsten Carbide Overlay**

Used in heavy wear combined with high-flow applications.



#### **Specialized Field Repair**

Our team delivers the field services you need, when you need them the most.



#### WE DO REPAIR SERVICES

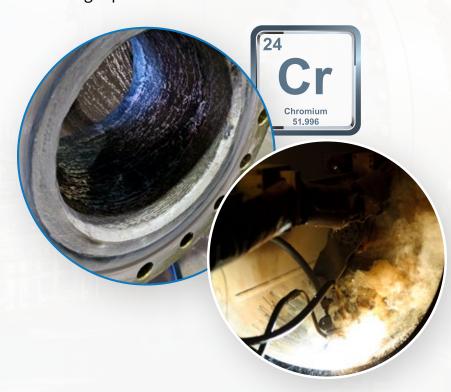
Our emergency response team can quickly mobilize with the expediency and expertise you need to handle all your overlay concerns.



#### **CHROMIUM CARBIDE OVERLAY**

From consumables to final fabrication, our Chromium Carbide Overlay is proudly manufactured in Alberta, Canada. Leveraging unique, vertically integrated operations allow for premium grade overlay solutions designed to withstand even the most hostile environments.

Our patented and semi-automated machines allow for multi-position welding and the highest quality performance. We are proven industry leaders in experience and technical knowledge and pride ourselves on delivering sustainable products with a customer-first approach to deliver reliable products at the right price.





#### **SERVICE INDUSTRIES**



Oil & Gas



Mining & Crushing





**Pump/Rotating Equipment** 

**Petro Chemical** 



Construction



Industrial Machinery & Equipment

# **APPLICATIONS**



Hydro-transport parts and piping like laterals, wye fittings, reducers, induction bends, and elbows can be made with our Chromium Carbide Overlay.



Heavy equipment and machinery applications such as bulldozer blades, cement trucks, and excavator buckets are common uses for CCO.



Pumps, impellers and suction plate or bearing liners.



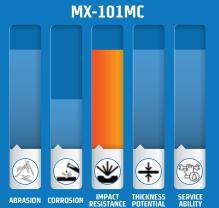
Chute liners, apron-feed liners, and gyratory crusher liners are very common uses in the mining industry.

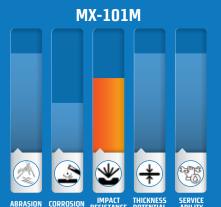


Chromium Carbide Overlay can be applied to almost any alloy that requires wear protection.

# **QUALITY METRICS**

Chromium Carbide Overlay is a cost-effective wear solution. With versatile application potential, CCO is a cornerstone of wear products.









#### **CHROME WHITE IRON**

Our Chrome White Iron solutions offer superior abrasion-resistant sleeves to create a serviceability advantage and increase your operational time. The ability to manufacture sleeves with larger thicknesses, can significantly increase the lifespan of the protected asset.

In addition, collaborating with Demir Engineering gives us the flexibility and innovation to customize products according to your unique production needs.

Together, we've developed a specialized piping solution that utilizes Chrome White Iron liners, in a modular and repairable manner, to maintain strength and performance throughout the product's life cycle.



#### **SERVICE INDUSTRIES**



Mining & Crushing

**Hydraulic Fracturing** 



**Pump/Rotating Equipment** 



**Petro Chemical** 

Pulp & Paper

#### **SUSTAINABILITY**



Repairable

Reusable

# **APPLICATIONS**



Pumps, volutes, impellers and suction plate or bearing liners are some of the most common uses for chrome white iron.



Complex Spool Insert

Chute liners, apron-feed liners, and gyratory crusher liners are very common uses in the mining industry.



Recycling-plant parts like blow bars, anvils and throw shoes are best made in high chrome white iron.

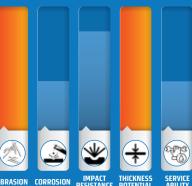


Hydro-transport parts like laterals, wyes, reducers, and elbows can be made with our chrome white iron.

#### **QUALITY METRICS**

Our Chrome White Iron application includes Leading Edge Sleeves that are a unique feature in the wear market.

#### **Chrome White Iron**









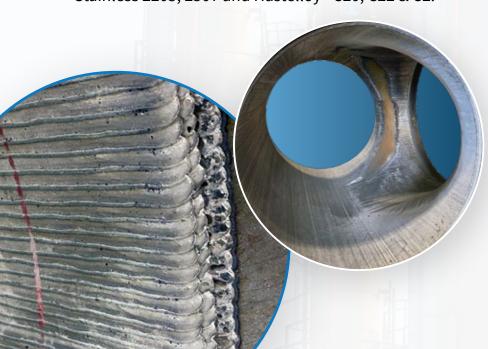




#### **CORROSION RESISTANT ALLOYS**

Corrosive environments are no match for our technical knowledge, overlay expertise, and suite of Corrosion Resistant Alloys. We offer flexible and customized solutions developed and deployed from Alberta, Canada, that are trusted worldwide.

By combining our ingenuity with strategic partnerships, and cutting-edge welding equipment, we offer over 300 material and overlay weld procedure combinations for a wide variety of applications. Defend your process equipment, reduce your maintenance, and reap the long-term cost advantages of our high-performance Corrosion Resistant Alloys. Commonly used overlay solutions include but are not limited to 300-400 Series Stainless Steel, 904L Aluminum Bronze, Stellite® #6, #1 & #712, Tungsten and Chromium Carbide, Duplex Stainless 2205, 2507 and Hastelloy® C20, C22 & C2.





#### **SERVICE INDUSTRIES**



Oil & Gas



Petro Chemical



**Chemical Processing** 



Mining

**Geothermal** 



**Waste Treatments** 



Aerospace

Nuclear



**Pharmaceutical** 

#### **APPLICATIONS**



High temperature corrosion and wear resistance applications.



Valves, spindles, and on the high wear surfaces such as stems, balls, seats, gates, discs, plugs, and flapper valves.

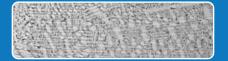


Stack liners, dampers, heat exchangers, reaction vessels, evaporators, reactors and tube sheets.

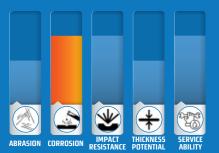
Piping systems including pipe, elbows, tees, flanges, gasket facing.



#### **QUALITY METRICS**



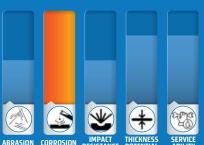
#### Stellite® Overlay



designed for resistance to corrosion, erosion. and abrasion at elevated temperatures.



#### Hastelloy® Overlay



which exhibits excellent corrosion resistance. It is used in a variety of environments from moderately oxidizing to strong reducing



#### Inconel® Overlay



Inconel overlay is a nickel based super allo which exhibits excellent corrosion resistance for service in extreme environments subjected to pressure and heat.



# **ASSET INTEGRITY MONITORING (AIM)**

Asset Integrity Monitoring is our secret weapon against the early detection of declining asset integrity and protection performance. This specialized technology predicts and prevents failures before they happen so that you can continue to reap the rewards of productivity - without costly downtime.

#### **TECHNOLOGY** SPONSOR:





Our relationship with Spartan Controls and Emerson creates a joint wear monitoring solution for AssetArmor™ that offers a cloud-based connection to your existing systems, infrastructures, and on-site equipment to life cycle forecasting data integration and product performance reporting.

#### Why We Trust AIM for AssetArmor™

- Safe and secure access to your network
- Portable connectivity to expert technicians
- Remote configuration, fault diagnosis and calibration support
- Reduced mobilization, logistics and travel costs
- Reduced downtimes and potential production loss
- Increased support response times
- Increased performance and reliability



#### **SERVICE INDUSTRIES**



Oil & Gas



**Petro Chemical** 



**Chemical Processing** 



Mining

Geothermal



**Waste Treatments** 



Aerospace

Nuclear



**Pharmaceutical** 

#### **SUSTAINABILITY**



Wear prevention

**Environmentally friendly** 

#### **APPLICATIONS**



Hydro-transport parts and piping like laterals, wye laterals, reducers, induction bends, and elbows.



Heavy equipment and machinery applications such as bulldozer blades, cement trucks, and excavator buckets



Pumps, impellers, and suction plate or bearing liners.

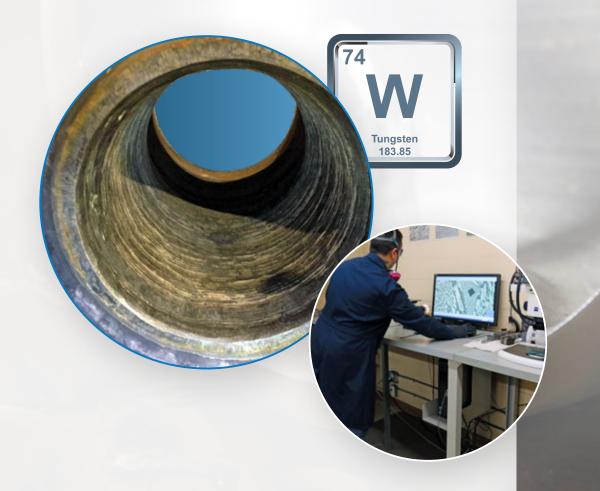




#### **TUNGSTEN CARBIDE OVERLAY**

Tungsten carbides metal matrix overlay is used in extreme wear applications with high flow. AssetArmor™ Tungsten Carbide Overlay application allows for complex spool fabrication giving clients the ability to maximize the life of their assets.

Tungsten Carbide Overlay is used in heavy wear combined with high flow applications maximizing run time. AssetArmor™ WCO is customizable and repairable allowing flexibility for clients' most critical projects.



#### **SERVICE INDUSTRIES**



Oil & Gas



Mining & Crushing

**Hydraulic Fracturing** 



**Pump/Rotating Equipment** 



**Petro Chemical** 

**Logging & Forestry** 



Construction



Aerospace & Aeronautics



Railroad



Industrial Machinery
& Equipment



**Wind Power** 



Pulp & Paper

Power Generation





Agriculture





**Power Transmission** 

## **APPLICATIONS**



Pumps, volute impellers and suction plate or bearing liners are some of the most common uses for tungsten carbide overlay.



Chute liners, apron-feed liners, and gyratory crusher liners are very common uses in the mining industry.



Recycling-plant parts like blow bars, anvils and throw shoes are best made in tungsten carbide overlay.

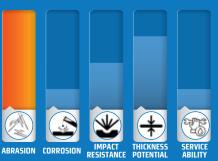


Hydro-transport parts like laterals, wyes, reducers, and elbows can be made with our tungsten carbide overlay.

#### **QUALITY METRICS**

Open arc flux cored hard facing is perfect for severe abrasion and low impact applications. The deposit contains the high distribution of primary tungsten carbides in a matrix of NiCrBSi alloys perform exceptionally well in both fine and coarse abrasion.

#### **Tungsten Carbide Overlay**



# SPECIALIZED FIELD REPAIR SERVICES

With support from ClearStream, Flint and Universal Weld Overlays, we offer comprehensive pull-through field services across Western Canada to defend and extend your most critical assets. Trust our emergency response team to quickly mobilize our automated shop/field hybrid equipment with the expediency and expertise you need for all your process equipment protection - 24/7, including on-site corrosion repairs, asset maintenance, and alterations.

Our customer-first approach, specialized equipment, advanced automated welding procedures, and innovative team deliver on the field services you need - when you need them the most.

# WELDING & FABRICATION EXPERTISE

Proud holder of ASME U, ASME U2 & S certification, enabling us to provide a wide range of services from the supply of ASME code-compliant equipment and pressure vessels to subcontract welding on free-issue ASME standard material.

#### **OUR CERTIFICATION**













# **24/7 EMERGENCY CONTACT**

**(587) 598-5602** *Field Welding Specialist* 

#### **OFFICE LOCATION**

135 East Lake Blvd Airdrie, AB, Canada T4A 2G1

**AVAILABLE** 

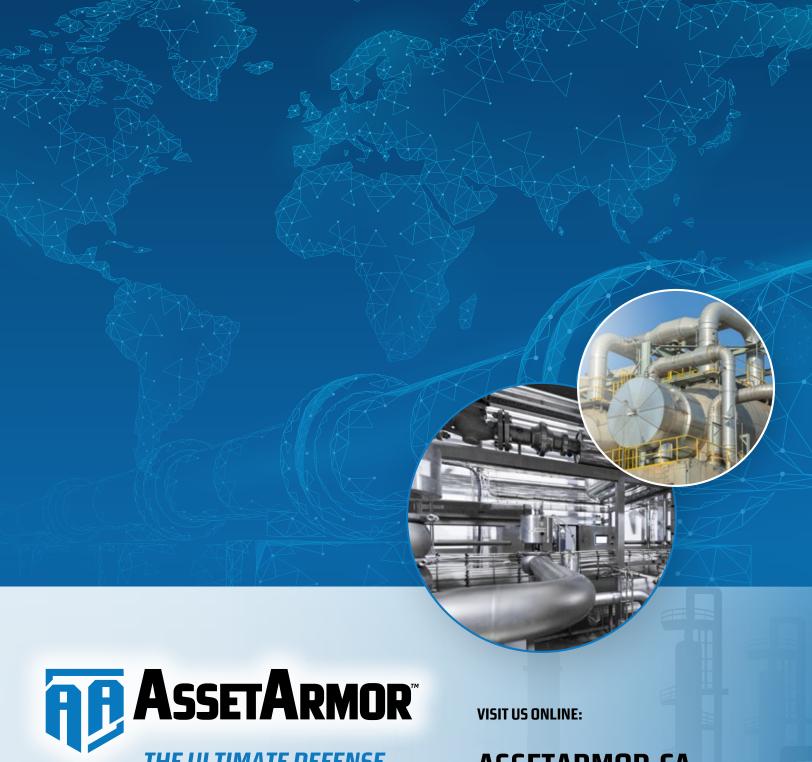
**SERVICE AREA** 

Mobilized services ready to defend your process equipment - 24 hours a day, 365 days a year.

**BRITISH** 

**COLUMBIA** 

**ALBERTA** 





THE ULTIMATE DEFENSE FOR YOUR MOST CRITICAL ASSETS

ASSETARMOR.CA