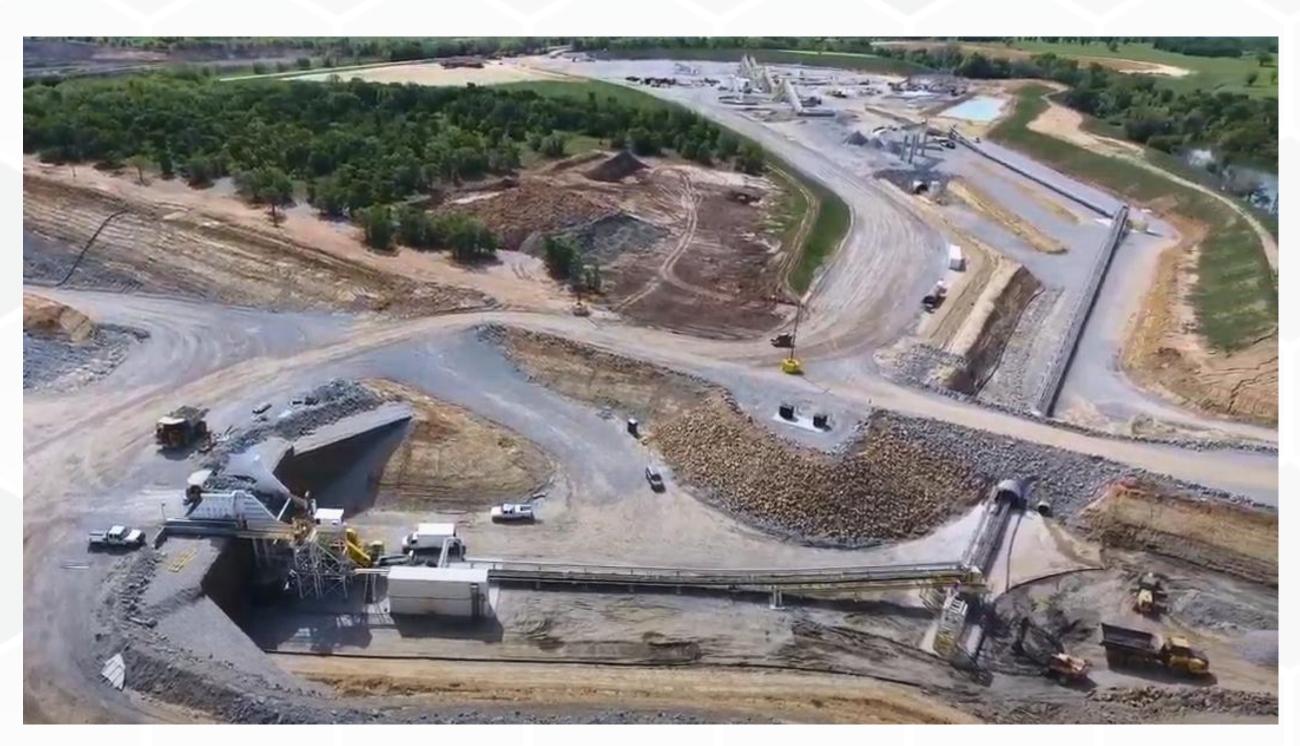




#### - Overland, Interplant Conveyors and 12,800 Ton Live Surge

- 42" BW x 230' Long Overland Conveyor at 1,100 TPH (Primary Crushed Rock -14")
- 42" BW x 735' Long Overland Conveyor at 1,100 TPH (Primary Crushed Rock -14") with a Custom Tail Take-Up System
- 42" BW x 450' Long Overland Conveyor at 1,100 TPH (Primary Crushed Rock -14") with a Custom Tail Take-Up System
- 42" BW x 185' Long Custom Surge Pile Stacker at 1,100 TPH (Primary Crushed Rock -14")
- with a Wrap Drive and Gravity Take-Up
  - 48" Deep Custom Truss
  - Dual Walkway
  - Dual Power Travel (2) at 3 HP = 6 HP
  - o Includes custom head stair to access secondary surge pile conveyor
- 42" BW x 102' Long Custom Surge Pile Conveyor at 1,100 TPH (Primary Crushed Rock -14")
  - 8' Deep Truss with 40' Cantilever to Feed Surge Pile
- 42" BW x 558' Long Surge Reclaim Conveyor at 1,100 TPH (Primary Crushed Rock -14") with a Custom Tail Take-Up System
  - Includes (6) Feed Points along Conveyor Line
- Plus and additional (26) Interplant Transfer Conveyors
- Total of + 4,600' of Conveyors





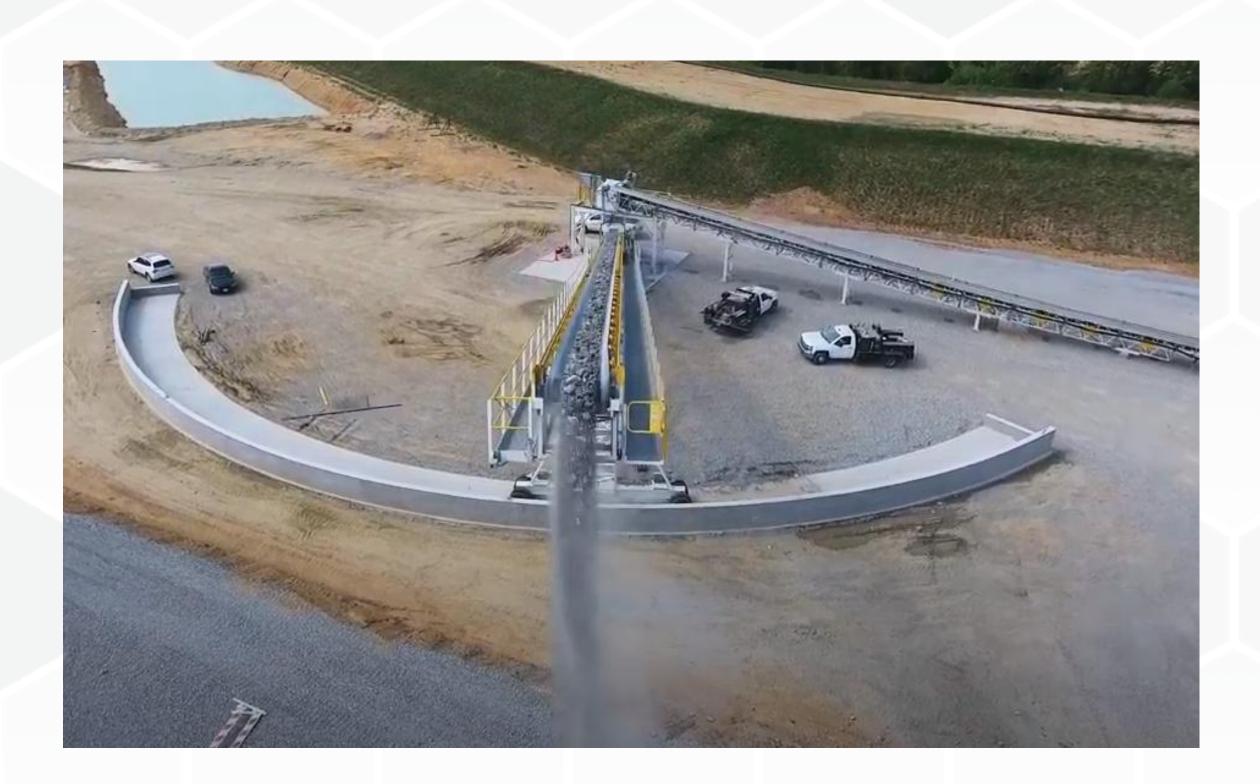






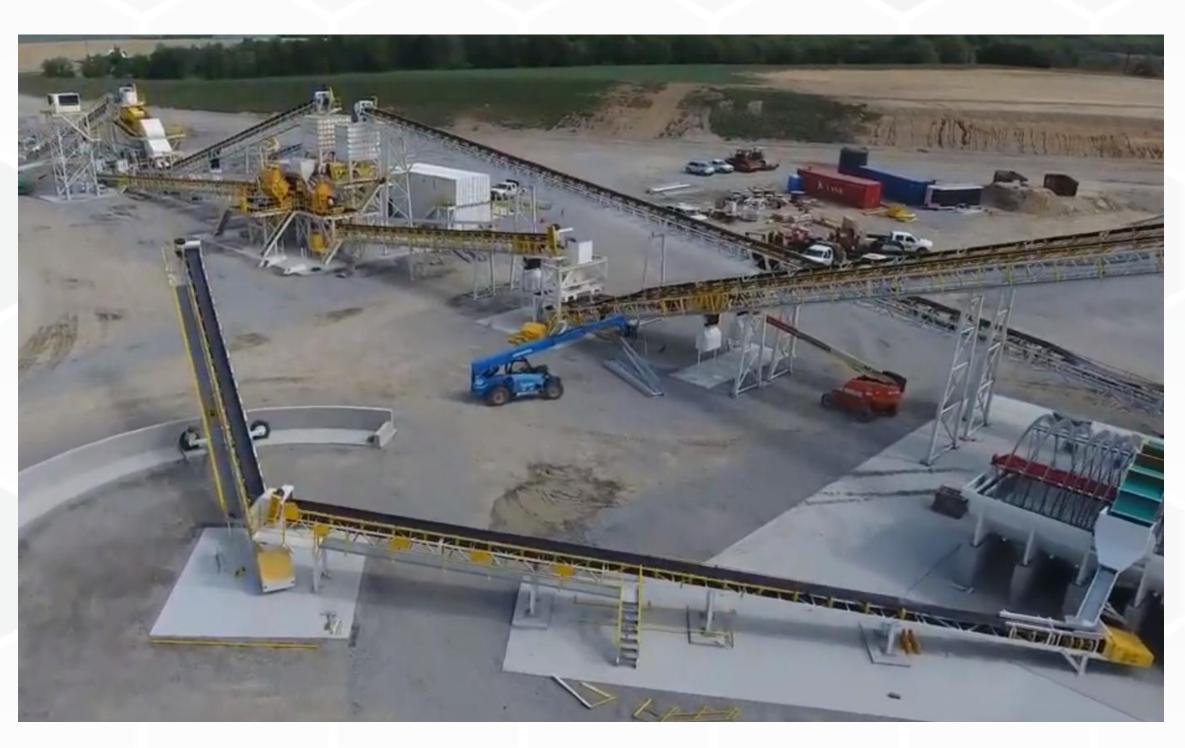






- 42" BW x 185' Long Surge Stacker
  - 1,100 TPH of -14" Primary Crushed
     Stone
  - Dual Drive (2) at 50 HP = 100 HP
  - Wrap Drive
  - Dual Walkway with access to a Secondary Raised Conveyor
  - Gravity Take-Up
  - Dual Power Travel (2) at 3 HP = 6 HP
  - Feeds either a 12,800 Ton Live Surge
     Pile or a Secondary Elevated Surge
     Conveyor

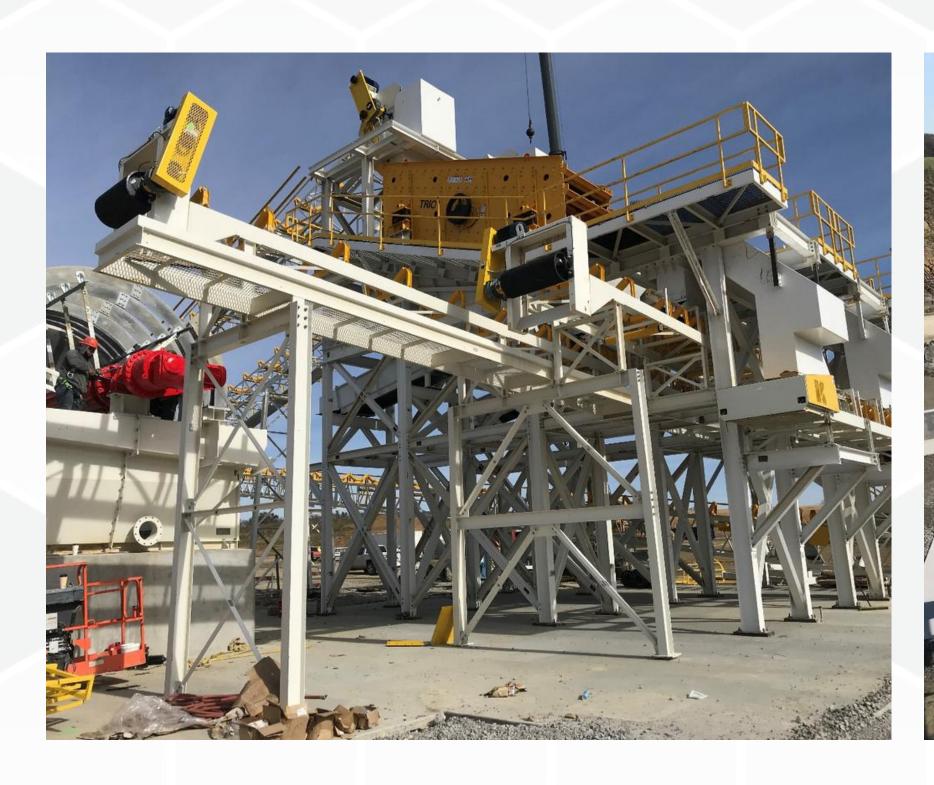




- Overland Conveyors
  - +1,400' of 42" BW Conveyors
  - 1,100 TPH of -14" Primary Crushed Stone
  - Gravity Take-Up and Custom Tail
     Take-Ups
  - Conveyor #2 goes under haul road
  - Combination of Channel Frame and Truss

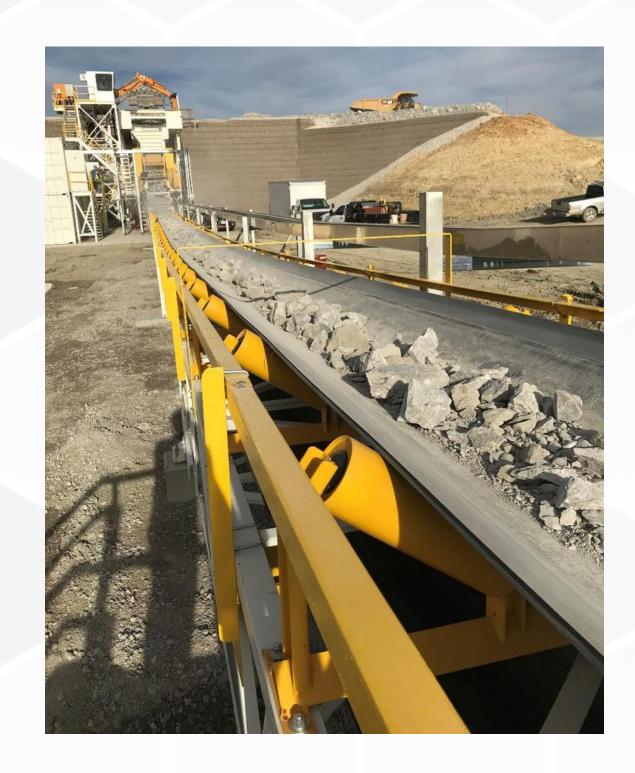


















- Total of 4,565' of Conveyors Overland, Interplant and Product Stackers
- (30+) Custom Interplant Conveyors, (2) Thor Telescopic Stackers & (6) Radial Stackers
- Overland Conveyors
- 36" BW x 450' Long at 850 TPH (Primary Crushed Rock -14")
- 36" BW x 1,185' Long at 850 TPH (Primary Crushed Rock -14") with Custom Tail Take-Up System
- 36" BW x 585' Long at 850 TPH (Primary Crushed Rock -14") with Custom Tail Take-Up System
- 36" BW x 1,235' Long at **850 TPH (Primary Crushed Rock -14")** 
  - Includes a **150' Span within a Gallery Truss** to allow for Pipeline Right of Way











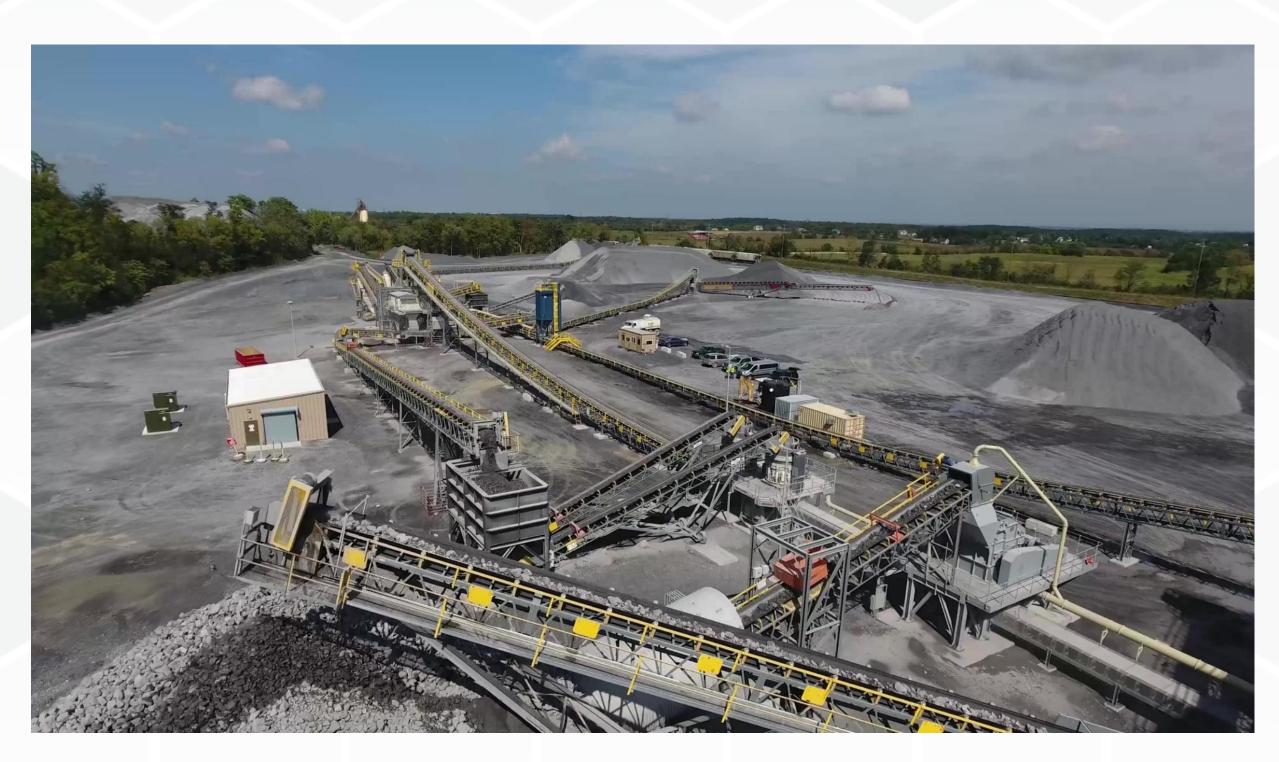












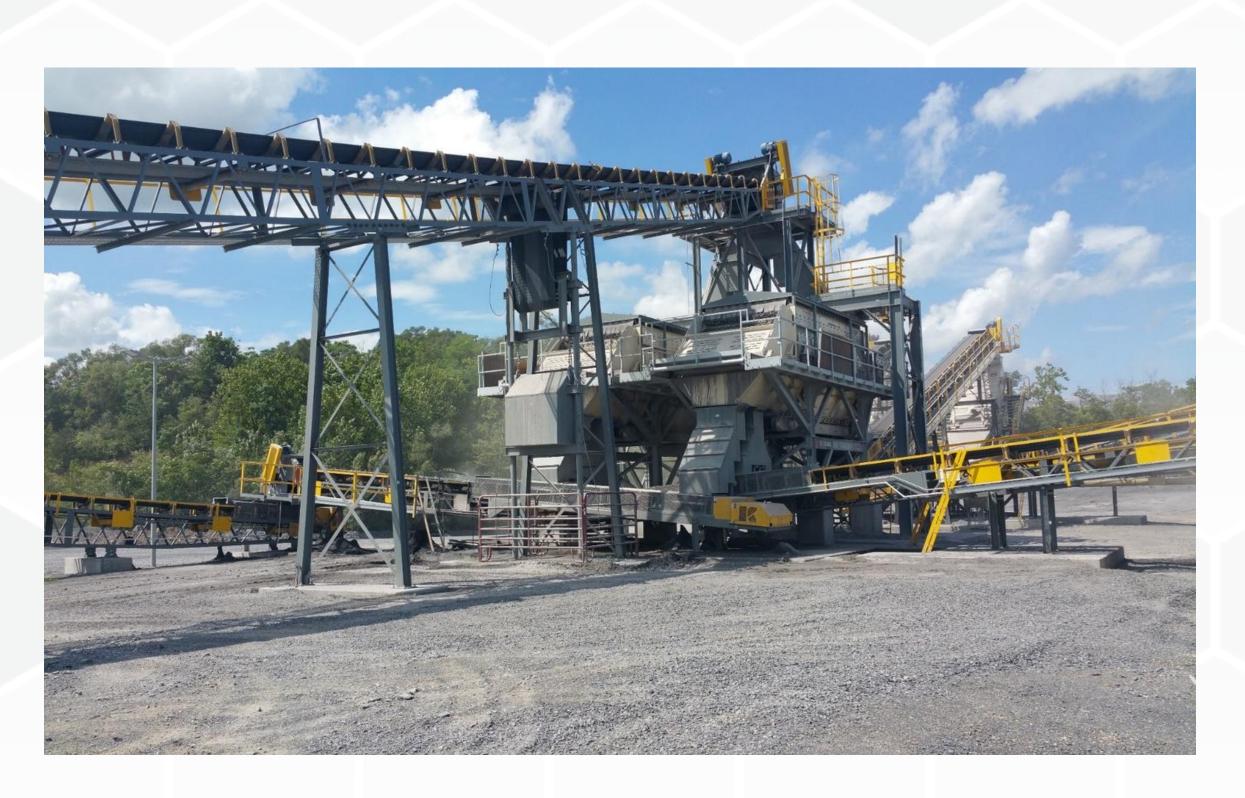






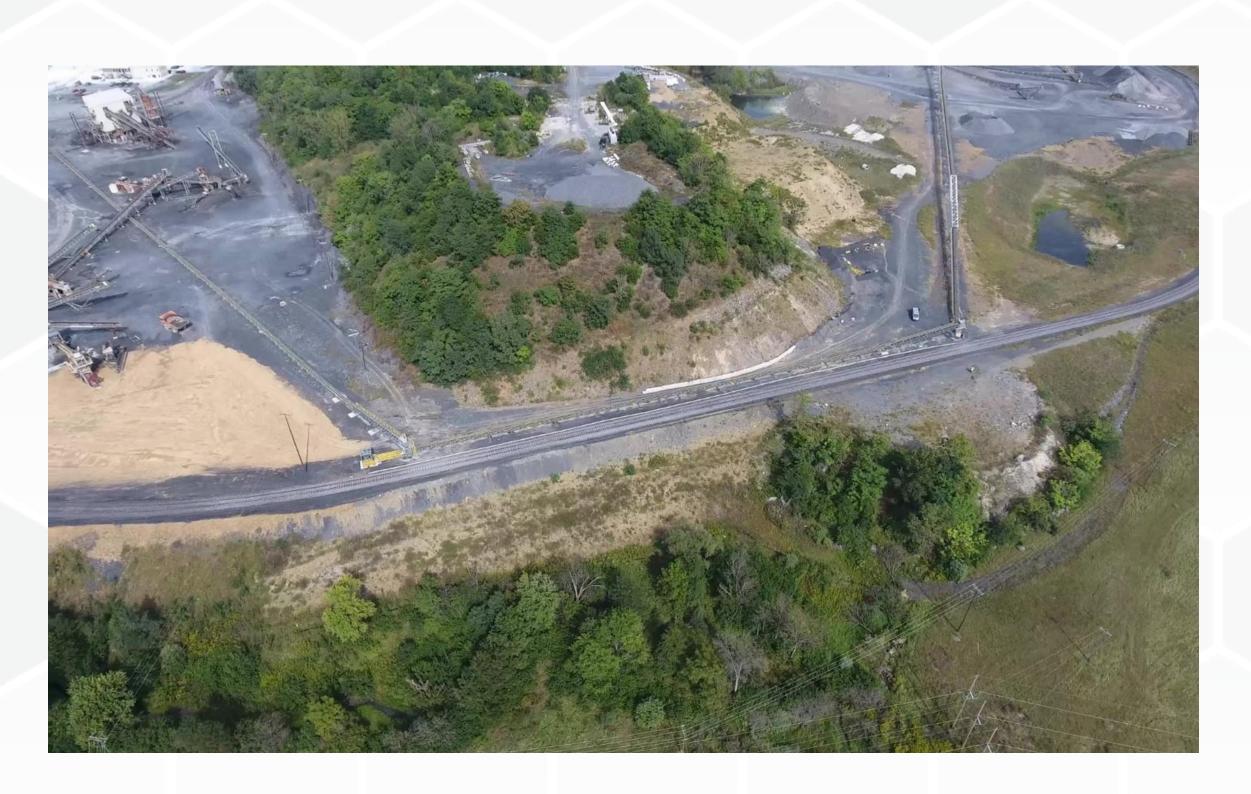
- 48" BW x 400' Long Conveyor with:
  - (4) Collecting Points
    - (1) Screen
    - (1) Horizontal Shaft Impactor Crushers
    - (2) Cone Crushers
  - 1,400 TPH
  - Dual Drive (2) @ 50 HP = 100 HP
  - Dust Collection Pickup Points
  - Covered Skirtboard





- Gravity Take-Ups
  - Each gravity take-up is specifically deigned to the application
  - Fully guarded truss on top and sides where walkway exist
  - Guarding can be easily removed with minimal tools for ease of maintenance
  - Each weight box is designed to hold 57's stone for the counterweight, a fill line is provided to hit the exact weight needed with a +/- tolerance to allow for future growth





- Overland Conveyor System
  - o 3,455' of Conveyor
  - Up To 1,000 TPH Average 850 TPH
  - 36" BW x 450' Long
  - o 36" BW x 1,185' Long
    - Tail Take-Up
  - 36" BW x 585' Long
    - Tail Take-Up
  - 36" BW x 1,235' Long
    - 150′ Gallery Truss





- Overland Conveyor System
  - Minimal infrastructure required
  - Concrete needed only at the head and tail of conveyor
  - Intermediate sections can be set up on railroad ties
  - Inside handrail or pull chord standard





- Custom Tail Take-Ups
  - For when head clearance is an issue use this gravity take-up designed at the tail of the conveyor
  - Weight box is specifically designed for each application
  - Low maintenance cable and sheave
  - Provides constant tension on belt
  - Keeps weight box low to grade for extra safety
  - Fully guarded runway and tower
  - Has been installed on conveyors between 500' and 1,800 long





- Elevated Overland System
  - Long spans for minimal concrete
  - Walkway full length of conveyor
  - Intermediate stair / maintenance tower for access mid way along conveyor line
  - Spans can be adjusted based on belt width and capacity anywhere from 30' up to +200'



- Total of 4,966' of Interplant Conveyors
  consisting of (21) Unique Conveyor Designs
  (14) Conveyors handle Construction
- (14) Conveyors handle Construction Aggregate and (7) Handle Lime
  - 24" to 36" BW
  - 25' Long up to 614' Long
  - 80 TPH up to 800 TPH
  - 55 PCF (lime) to 100 PCF (limestone)
  - Spans from 30' up to 120'
  - Support heights up to 90'
  - Drive Sizes up to 100 HP



































- Rail Loadout System at 3,500 TPH
  - 54" BW x 300' Long Surge Bin Feed
    - Dual 200 HP Drives = 400 HP Installed







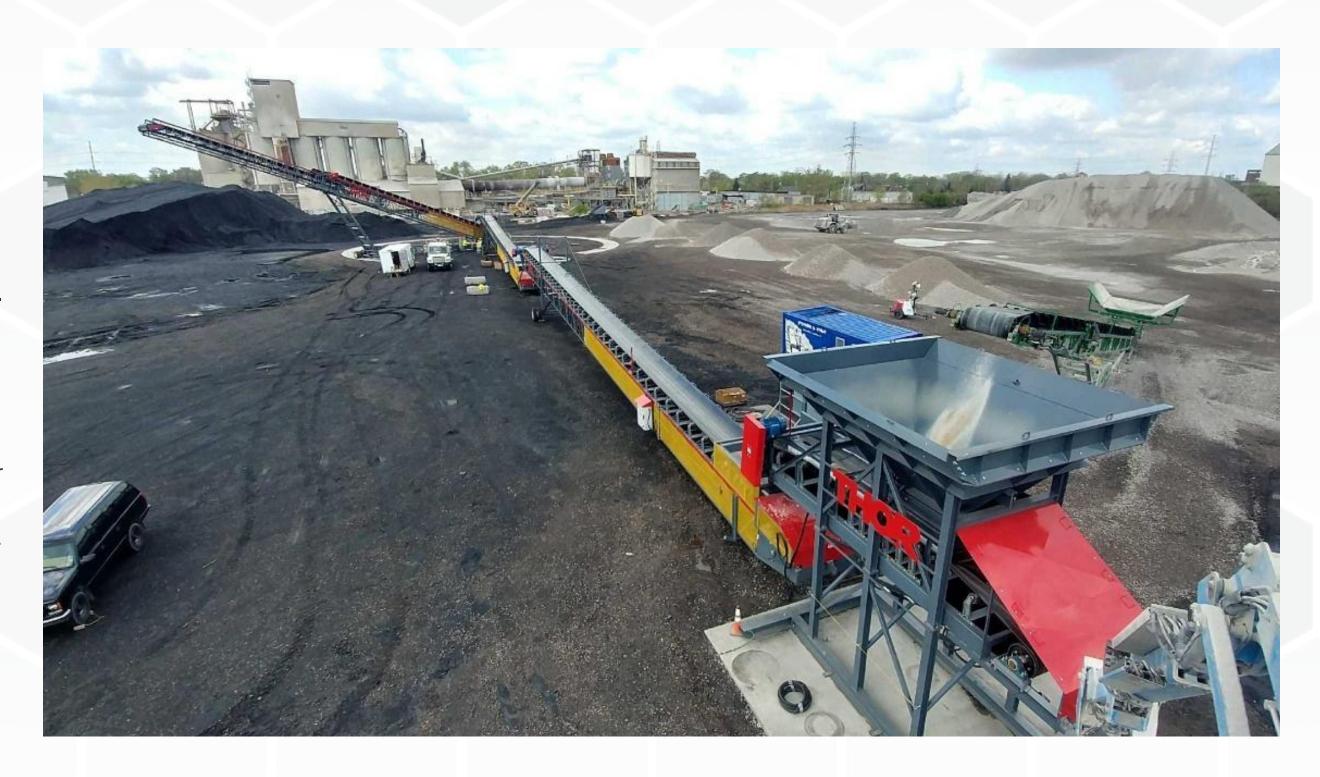




#### Construction Aggregate & Coal Barge Unloading #5



- Barge UnloadingSystem at 3,200 TPH –Coal and Limestone
  - 60" BW Belt Feeder
  - (2) 54" BW x 150' Long Transfer Conveyors
  - (1) 54" BW x 150' Radial Stacker



### Construction Aggregate & Coal Barge Unloading #5









- (1) Belt Feeder 36" BW x 18' Long at 400 TPH
  - Belt Feeder sits under a custom 80 Ton Live Truck Dump Hopper
- (1) Custom Conveyor 1,635' Long with~200' Gallery Truss over Wetlands
  - Custom Tail Take-Up System
- (1) Thor Telescopic Radial Stacker







- Custom Tail Take-Up
  - Weight box is specifically designed for each application
  - Low maintenance cable and sheave
  - Provides constant tension on belt
  - Keeps weight box low to grade for extra safety
  - Fully guarded runway and tower
- Belting Considerations
  - Due to permitting restrictions, requiring a 24" BW conveyor extra thought was taken into consideration or belting
  - Troughability, PIW, Ply of Belting and overall tensions
  - Ended up with a Single Ply 440
     Belt



- Gallery Truss Spanning Wetlands
  - 200' Long Gallery Truss
  - Helical Pile Design for Concrete
- Environmental Conditions
  - Due to environmental conditions many belt scrapers were installed on this conveyor – nothing can fall into the wetland area
  - (1) Tungsten Carbide Tipped Primary Scraper
  - (1) Tungsten Carbide Tipped Secondary Scraper
  - o (2) Urethane Flat Bladed Secondary Scrapers
  - (1) Motorized Brush Cleaner with Nylon Bristles
  - o (1) V-Plow
  - (1) Beater Bar Return Idler





- Supports and Spans
  - Due to site conditions supports
     needed to be minimized and thus
     spans needed to be increased
  - As the conveyor reached closer to the wetland area clay seams were very prevalent
  - Solution to clay seams were a unique style of concrete design utilizing helical piles driven deep into the clay to provide proper bearing
  - Spans are approximately 100' while in the clay seam with 6' deep truss design





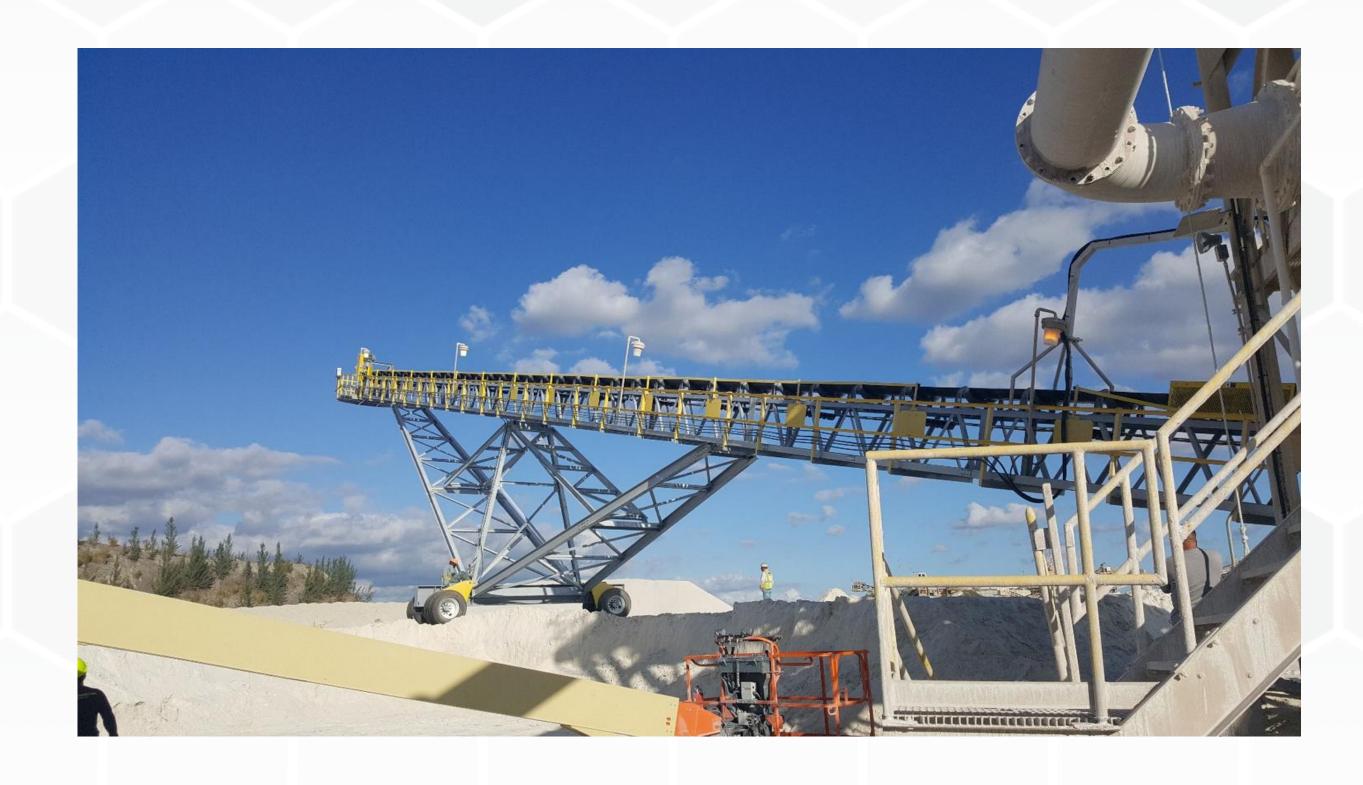






#### - 30" BW x 150' Long Radial Stacker

- 30 HP
- 450 TPH
- Galvanized Structure
- Wrap Around Head and Tail Platform
- Dual Power Travel (2) at 3 HP = 6 HP





- 42" BW x 590' Long Out of Pit Conveyor
  - 600 TPH of Primary Crushed Rock -12"
  - Dual Drive (2) at 75 HP = 150 HP
  - Supports utilizing multiple benches along the quarry face
  - Max distance between concrete piers approximately 100'









