



Custom Neutral Cleaners

"Neutral" Cleaners are products with captive alkalinity or very mild acidity and cannot be categorized specifically as acid or alkaline cleaners. Some of these are general cleaners and degreasers while some have more specific purposes

TriSolve OxySolve

OxySolve is high strength peroxide based cleaner for a myriad of complex soils. When activated with 10% AlkaSolve E or other alkalinity source this product becomes a very potent oxygen cleaner. A product unique to Solve! Once activated it can be used at a ratio of 1:5 to 1:20. Useful for all tenacious organic soils. Press applications (BOF or continuous – up to 4000 ppm).

TriSolve OxySolve NP

OxySolve NP is a high strength peroxide based cleaner for a myriad of complex soils. When activated with 10% AlkaSolve E or other alkalinity source this product becomes a very potent oxygen cleaner. A product unique to Solve! Once activated it can be used at a ratio of 1:5 to 1:20. Useful for all tenacious organic soils. This formulation does not include any inorganic phosphate for waste systems that have limited phosphate tolerance. Press applications (BOF or continuous – up to 4000 ppm).

TriSolve OxySolve LF

OxySolve LF is a high strength low foaming peroxide based cleaner for a myriad of complex soils. When activated with 10% AlkaSolve E or other alkalinity source this product becomes a very potent oxygen cleaner. A product unique to Solve! Once activated it can be used at a ratio of 1:5 to 1:20. This product is specifically formulated for boilout or recirculating system cleaning and has a lower foaming propensity that OxySolve. Press applications (BOF or continuous – up to 4000 ppm).

TriSolve DG

TriSolve DG is a non-solvented general purpose degreaser for light to moderate oil and grease soils.

Can be used with heavier alkaline products when heavy or specialty greases with high inorganic content are present. Can be at 1:1 to 1:20 strength on organic and oil based soils. This is a safe, highly biodegradable cleaner.

TriSolve DG-2

TriSolve DG-2 is a concentrated non-solvented general purpose degreaser for light to moderate oil and grease soils. Can be used with heavier alkaline products when heavy or specialty greases with high inorganic content is present. Can be at 1:2 to 1:10 strength on organic and oil based soils. This is a safe, highly biodegradable cleaner.

TriSolve SafeClean

TriSolve SafClean is a solvented general purpose cleaner and degreaser for light to moderate oil and grease and organic soils. Can be used with heavier alkaline products when heavy or specialty greases with high inorganic content is present. Can be at 1:1 to 1:20 strength on organic and oil based soils. This is a safe, highly biodegradable cleaner.

TriSolve SafeClean -2

TriSolve SafClean is a concentrated solvented general purpose cleaner and degreaser for light to moderate oil and grease and organic soils. Can be used with heavier alkaline products when heavy or specialty greases with high inorganic content is present. Can be at 1:2 to 1:10 strength on organic and oil based soils. This is a safe, highly biodegradable cleaner.

TriSolve PressSolve NFC

TriSolve PressSolve NFC is a neutral highly chelated and lightly solvented product for the continuous and batch cleaning of wet press felts. This product is specifically designed to combat heavy inorganic soils found in high ash recycle systems, and furnishes with high amounts of calcium carbonate, titanium dioxide, clay, talc or fillers. Generally used in combination with an acid or alkaline PressSolve product, this product is designed with halogen scavenging and scale control capability for shower system usage. Specifically designed for high temperature shower waters.

TriSolve EcoSolve 400

TriSolve EcoSolve 400 is a non-solvented general purpose cleaner and degreaser for light to moderate organic soils. This captive alkalinity product can be used for cleaning dryer fabrics where seam compatibility needs to be assured. Can be used with heavier alkaline products when heavy or specialty greases with high inorganic content is present. Can be at 1:1 to 1:20 strength on organic and oil based soils. This is a safe, highly biodegradable cleaner.

TriSolve EcoSolve 500

TriSolve EcoSolve 500 is a solvented general purpose cleaner and degreaser for light to moderate organic soils. This captive alkalinity product can be used for cleaning dryer fabrics where seam compatibility needs to be assured. Can be used with heavier alkaline products when heavy or specialty greases with high inorganic content is present. Can be at 1:1 to 1:20 strength on organic and oil based soils. This is a safe, highly biodegradable cleaner.

TriSolve DryerClean HF

TriSolve DryerClean HS is a solvented general purpose cleaner and degreaser for fouled dryer fabrics. This captive alkalinity product can be used for cleaning dryer fabrics where seam compatibility needs to be assured. This product has a flash point of 85 deg C/180 deg F and can be used during start-up for cleaning of dryer fabrics. Can be used with heavier alkaline products when heavy or specialty greases with high inorganic content is present. Can be at 1:1 to 1:20 strength on organic and oil based soils. This is a safe, highly biodegradable cleaner.

TriSolve SafeClean BOCA

TriSolve SafeClean BOCA is a highly built boilout additive. This product contains wetting agents, penetrants, sequestrants, antiredeposition agents and surfactants. This product is intended to be added to an alkalinity source for a process boilout application. Final concentration of this material will be in the 0.5% to 3.0% range depending upon alkalinity and process temperature. This is a safe, highly biodegradable cleaner.

These products are selected based on the specific soil, substrate and application method. Some of these products can be used stand alone and others need to be used with one or more products for ideal cleaning. Discuss each application with Technical Services.

Custom Solvent Cleaners

"Solvent" Cleaners are custom built solvent based cleaners that contain penetrants, wetting agents, surfactants and solvents (natural and/or hydrocarbon) for cleaning complex organic soils. Care must be taken during product selection to ensure method of application allows for good soil/cleaner contact. In general solvents have low flash points. Some of these products have high flash points but care must be taken to evaluate the application to ensure safe product usage.

TriSolve OptiSolve Max

TriSolve OptiSolve Max is a high strength natural source cleaner for spot and batch cleaning of very heavy organic soils. This product has a very low flash point and must be used at low temperature and must be used with ample rinse water. This product needs to be used at 1:1 or 1:2 concentrations ideally directly on the soil.

TriSolve BioClean RC

TriSolve BioClean RC is a full strength recycled hydrocarbon solvent cleaner. Sourced exclusively from recycled materials this cleaner can be used for general oil and hydrocarbon cleaning or for the cleaning of organic materials off of synthetic or highly polished metal and composite surfaces. Can be used at 1:10 to 1:100 concentrations and contains hydrotropes to assist with dispersion in the water phase and rinsing.

TriSolve OptiSolve AH

TriSolve BioClean RC is a full strength aliphatic hydrocarbon solvent cleaner and surface treatment. This product can be used for the cleaning of organic materials off of synthetic or highly polished metal and composite surfaces and continuous feed for control of these deposits. Can be used at 1:10 to 1:100 concentration and contains hydrotropes to assist with dispersion in the water phase and rinsing.

TriSolve DryerClean 600 HF

TriSolve DryerClean 600 is a multisolvent cleaner used for the buildup of heavy stickies and oils and greases on dryer fabrics. This cleaner utilizes five solvents and penetrants to tackle the complex organic and heat set soils found on dryer fabric in secondary fiber and heavily sized grades. Can be used at 1:1 to 1:10 concentration and contains hydrotropes to assist with dispersion in the water phase and rinsing. The flash point of this product is 180 deg F/85 deg C.

These products are selected based on the specific soil, substrate and application method. Some of these products can be used stand alone and others need to be used with one or more products for ideal cleaning. Discuss each application with Technical Services.

Custom Alkaline Cleaners

"Alkaline" Cleaners are products with free alkalinity and are formulated to a very high pH and strength. Both sodium and potassium based alkalinity sources are used, and the selection of product will be based on the speed of rinsing and specific application. Most organic soils exhibit some form of reactivity to alkaline cleaners and as such are generally used in combination with solvent or chelants for broad spectrum reactivity.

TriSolve AlkaSolve E

TriSolve AlkaSolve E is a highly alkaline general cleaner used for alkaline reactive soils. This fast rinsing good foaming cleaner is highly active and good for a general range of soils. This product can be used to activate any of the OxySolve range of products to the final desired pH. Product usage ratios are 1:2 to 1:50.

TriSolve AlkaSolve DL

TriSolve AlkaSolve E is a very highly built, highly alkaline general cleaner used for alkaline reactive soils. When diluted properly, this product provides good foaming. A sodium based product with moderate rinsing, it is highly active and good for a general range of soils. This product can be used to activate any of the OxySolve range of products to the final desired pH. Product usage ratios are 1:10 to 1:50.

TriSolve UltraClean 780

TriSolve UltraClean 780 is a highly alkaline general cleaner used for alkaline reactive soils. This fast rinsing good foaming cleaner is highly active and good for a general range of soils. This product is very heavily chealted and is good for the cleaning of titanium dioxide and other complex inorganic and organic soils. Product usage ratios are 1:2 to 1:50.

TriSolve PressSolve 5050

TriSolve PressSolve 5050 is a highly alkaline solventized press felt cleaner used for alkaline reactive soils. This fast rinsing moderate foaming cleaner is highly active and good for a general range

of soils. This product can be applied in an Interval Cleaning (mini batch on the fly) process at concentrations from 1500 to 5000 ppm. This product is highly biodegradable and perfect for systems with a high degree of closure

TriSolve PressSolve 5050 LF

TriSolve PressSolve 5050 is a highly alkaline solventized press felt cleaner used for alkaline reactive soils. This fast rinsing low foaming cleaner is highly active and good for a general range of soils. This product can be applied in an Interval Cleaning (mini batch on the fly) process at concentrations from 1500 to 5000 ppm. This product is highly biodegradable and perfect for systems with a high degree of closure

TriSolve PressSolve 5050 NF

TriSolve PressSolve 5050 is a highly alkaline solventized press felt cleaner used for alkaline reactive soils. This fast rinsing non-foaming cleaner is highly active and good for a general range of soils. This product can be applied in an Interval Cleaning (mini batch on the fly) process at concentrations from 1500 to 5000 ppm. This product is highly biodegradable and perfect for systems with a high degree of closure

TriSolve PressSolve 5090 LF

TriSolve PressSolve 5050 is a moderately alkaline, highly solventized press felt cleaner used for alkaline reactive soils. This fast rinsing moderate foaming cleaner is highly active and good for a general range of soils. This product can be used for batch cleaning or for continuous or ICA press cleaning. This product can be applied in an Interval Cleaning (mini batch on the fly) process at concentrations from 1500 to 5000 ppm. This product is highly biodegradable and perfect for systems with a high degree of closure.

These products are selected based on the specific soil, substrate and application method. All of these products are highly alkaline and as such particular attention needs to be paid to PPE and exposure guidelines. Discuss each application with Technical Services.

Custom Gel Cleaners

"Gel" Cleaners are products are versions of our standard cleaners that are sold in "gel" form. These thixotropic gels are applied with minimal misting and provide much longer contact times on tenacious soils than foam or liquid cleaners. These gels are generally spot cleaners as opposed to larger surface cleaners as they generally take more time to apply. The products are dyed to a specific non-process color (orange, yellow, red, blue or green) to enhance product recognition if time is left between application and rinse

TriSolve SafGel

TriSolve SafGel is a solventized gel cleaning agent specifically designed for complex organic soils and general soils. Excellent for spot cleaning and other tenacious soils that benefit from enhanced contact time. Thorough rinsing is required after application as chemical residue is more likely to remain on application surfaces than with foam or liquid.

TriSolve AcidGel

TriSolve AcidGel is a solventized acid gel cleaning agent specifically designed for complex inorganic and general soils. Excellent for spot cleaning and other tenacious soils that benefit from enhanced contact time. Thorough rinsing is required after application as chemical residue is more likely to remain on application surfaces than with foam or liquid.

TriSolve AlkaGel

TriSolve AlkaGel is a solventized alkaline gel cleaning agent specifically designed for complex organic and general soils. Excellent for spot cleaning, "tidelines" in tanks and other tenacious soils that benefit from enhanced contact time. Thorough rinsing is required after application as chemical residue is more likely to remain on application surfaces than with foam or liquid.

TriSolve EcoGel

TriSolve EcoGel is a halogenated alkaline gel cleaning agent specifically designed for complex organic soils and biofilms. Excellent for spot cleaning, tank "tide lines" and other tenacious soils that benefit from enhanced contact time. Thorough rinsing is required after application as chemical residue is more likely to remain on application surfaces than with foam or liquid.

TriSolve SolveGel

TriSolve SolveGel is a solventized gel cleaning agent specifically designed for complex organic soils and heavy greases and oils. Excellent for spot cleaning, tank "tide lines" and other tenacious soils that benefit from enhanced contact time. Thorough rinsing is required after application as chemical residue is more likely to remain on application surfaces than with foam or liquid.

Custom Acid Cleaners

"Acid" Cleaners are products with free acidity and are formulated to a very low pH and strength. Both inorganic and organic acid cleaners are available depending upon the nature of the soil, the substrate and the specific use. All inorganic soils react with acid, and the addition of chelants and solvents helps to broaden the performance spectrum. Unlike solvent and neutral cleaners corrosion of the base substrate and neutralization needs to be a factor

SolveTec PurClean SAC

SafeClean SAC is a stabilized mineral acid used for cleaning mineral scales and acid reactive soils. This high strength formulation is good for most scales and can be safely applied to all surfaces except yellow metals. Product usage ratios are 1:2 to 1:50.

SolveTec PurClean BA

SafeClean BA is an organic acid cleaner and descaler. More moderate in strength than the SAC but includes a higher detergency for use in foaming applications and improved coverage, Usage ratios are 1:5 to 1:50. Excellent for the removal of barium scales as well as calcium scales.

SolveTec PressSolve AFC

PressSolve AFC is a specially formulated solventized acid felt cleaner. Used specifically for continuous, Interval Cleaning or batch cleaning of wet press felts. This minimal foaming acid cleaner is good for systems with high inorganic containing furnishes and will often be used alternating with an alkaline cleaner such as PressSolve 5050. Product usage rates are 1500 to 5000 ppm as continuous or Interval or up to 10% as a batch cleaner.

SolveTec PressSolve 7250

PressSolve 7250 is a specially formulated solventized acid felt cleaner. This product contains strong organic acids than PressSolve AFC for use with heavily buffered shower waters to minimize product consumption. Used specifically for

continuous, Interval Cleaning or batch cleaning of wet press felts. This minimal foaming acid cleaner is good for systems with high inorganic containing furnishes and will often be used alternating with an alkaline cleaner such as PressSolve 5050. Product usage rates are 1500 to 5000 ppm as continuous or Interval or up to 10% as a batch cleaner.

SolveTec PurClean MAC

SafeClean MAC is a stabilized mineral acid used for cleaning mineral scales and acid reactive soils. This multi-acid formulation is good for most scales and can be safely applied to all surfaces except yellow metals. Product usage ratios are 1:2 to 1:100.

These products are selected based on the specific soil, substrate and application method. All of these products are highly acidic and as such particular attention needs to be paid to PPE and exposure guidelines. Discuss each application with Technical Services.

Custom Process Cleaners and **Deposit Control**

"Process" Cleaners and Deposit Control
Agents are products that are specifically
designed to prevent deposition rather than
clean it from a surface. Whether it is for
the purpose of preventing deposits on
forming fabrics, rolls or to prevent scale in
process piping and systems this category
focuses on proactively eliminating a
deposit before it forms by modifying
charge, chemistry or surface properties

TriSolve FormTec Nano

TriSolve FormTec Nano is a neutral barrier treatment that can be applied to any operating surface on a paper machine (predominately wires and or felts) to capture stickies and other organic deposit related contaminants. Being neutral allows the nano particle to be easily applied and removed along with the adhered contaminant. Much more effective in highly charge sensitive systems than FormTec.

TriSolve FormTec

TriSolve FormTec is a cationic barrier treatment that can be applied to any operating surface on a paper machine (predominately wires and or felts) to capture stickies and other organic deposit related contaminants. FormTec has years of application success and is proven in every papermaking grade. Care must be used on dosing and feed control as this can accumulate on surfaces if over applied.

TriSolve PBO

TriSolve PBO is a high strength low foaming peroxide based specifically designed for polymer feed system boilouts. When activated with 10% AlkaSolve E or other alkalinity source this product becomes a very potent oxygen cleaner. A product unique to Solve! Once activated it can be used at a ratio of 1:5 to 1:20. This product is specifically formulated for boilout or recirculating system cleaning and has a lower foaming propensity than OxySolve. Product use will be 5-15% v/v, with a

necessity of 0.1% caustic per % product (0.5 to 1.5% as NaOH)

TriSolve ScaleTrol CWT

TriSolve Scaletrol CWT is a scale control additive for the control of calcium oxalate scale in papermaking process systems. This threshold inhibitor helps to minimize the effects of scaling on screens, shear points and low flow areas of the process piping. Calcium oxalate is a difficult scale to clean so control is a much more cost effective method of minimizing its impact.

TriSolve ScaleTrol

TriSolve Scaletrol is a scale control additive for the control of calcium sulfate and carbonates scale in papermaking process systems. This threshold inhibitor helps to minimize the effects of scaling on screens, shear points and low flow areas of the process piping. Minimizing the impact of this build up in critical equipment like shower nozzles, controls and other areas can ensure trouble free papermaking.

TriSolve RollClean

TriSolve RollClean is a blend of surfactants and cleaners to assist with the ongoing maintenance and cleanliness of press roll surfaces. Dirty and fouled press rolls can cause pickouts, holes, create excessive doctor blade wear and reduce machine speed. This safe and easy to apply product can be used to prevent and slowly clean deposits from roll surfaces.

TriSolve RollClean RC

TriSolve RollClean is a blend of surfactants, solvents and cleaners to assist with the ongoing maintenance and cleanliness of press roll surfaces. Dirty and fouled press rolls can cause pickouts, holes, create excessive doctor blade wear and reduce machine speed. This safe and easy to apply product can be used to prevent and slowly clean deposits from roll surfaces.