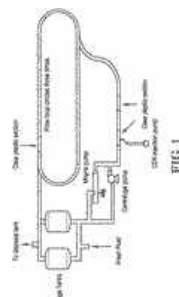
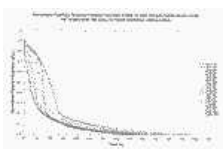
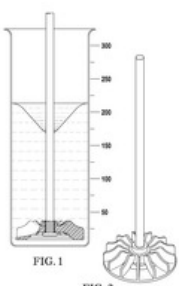
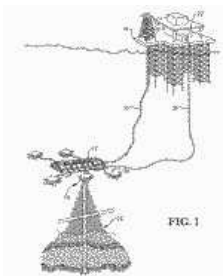
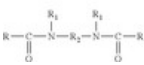
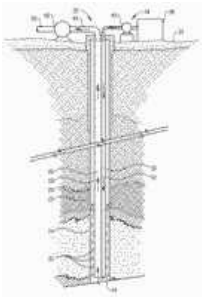
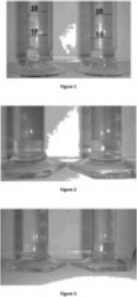
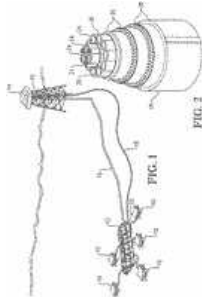
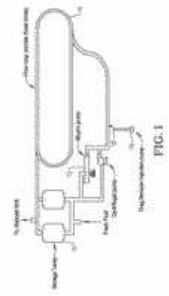


47108 results for Similar patents - Collection: FAMPAT

| #                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                         |   Title | Publication number | 1st App. date | Applicant/Assignee                                                                                    | Relevance score |
|-----------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------|--------------------|---------------|-------------------------------------------------------------------------------------------------------|-----------------|
| 1.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        | <a href="#">Plasticized latex formulations for improved pumpability</a>                                                                                                   | CA2942025          | 2015-01-27    | BAKER HUGHES*                                                                                         | 100 %           |
| <p>Hydrocarbon streams, such as crude oil streams, may have reduced drag when an effective amount to reduce drag of a drag reducing composition is added to a liquid hydrocarbon, where the drag reducing composition includes a drag reducing latex comprising at least one plasticizer in an amount effective to improve the ability to pump the latex into a hydrocarbon composition or stream with assured flow of the latex. Latex formulations are known to cause agglomerated particles during pumping operations, and the agglomerated hard particles tend to plug check valves in injection pump equipment, but the inclusion of at least one plasticizer reduces or prevents such problems.</p> |                                                                                                                                                                           |                    |               |                                                                                                       |                 |
| 2.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        | <a href="#">Modified latex drag reducer</a>                                                                                                                               | US2006148928       | 2004-12-30    | CONOCOPHILLIPS<br>LIQUIDPOWER SPECIALTY<br>PRODUCTS*<br>PHILLIPS 66                                   | 99 %            |
| <p>A modified latex drag reducer and methods of making and using the drag reducer in order to reduce friction losses resulting from turbulent fluid flow through a conduit. Particularly, the modified latex drag reducer is formed from an initial latex which is a product of an emulsion polymerization reaction. The initial latex is then modified, preferably by admixing with at least one low HLB surfactant or at least one solvent, or both, to form a modified latex with an enhanced dissolution rate in a hydrocarbon stream over the initial latex.</p>                                                                                                                                     |                                                                                                                                                                           |                    |               |                                                                                                       |                 |
|                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |                                                                                                                                                                           |                    |               |                                                                                                       |                 |
| 3.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        | <a href="#">Drag reduction of asphaltenic crude oils</a>                                                                                                                  | US2008149530       | 2006-12-22    | CONOCOPHILLIPS<br>CONOCOPHILLIPS<br>LIQUIDPOWER SPECIALTY<br>PRODUCTS*<br>LUBRIZOL SPECIALTY PRODUCTS | 99 %            |
| <p>A system for reducing pressure drop associated with the turbulent flow of asphaltenic crude oil through a conduit. The crude oil has a high asphaltene content and/or a low API gravity. Such reduction in pressure drop is achieved by treating the asphaltenic crude oil with a high molecular weight drag reducing polymer that can have a solubility parameter within about 20 percent of the solubility parameter of the heavy crude oil. The drag reducing polymer can also comprise the residues of monomers having at least one heteroatom.</p>                                                                                                                                                |                                                                                                                                                                           |                    |               |                                                                                                       |                 |
|                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        |                                                                                                                                                                           |                    |               |                                                                                                       |                 |
| 4.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        | <a href="#">Drag reducing copolymers for cold fluid applications</a>                                                                                                      | WO2010014307       | 2008-07-31    | CONOCOPHILLIPS<br>LIQUIDPOWER SPECIALTY<br>PRODUCTS*<br>PHILLIPS 66                                   | 99 %            |
| <p>Drag reducing compositions comprising polymer particles, where the polymer particles include copolymers comprising the residues of at least one methacrylate monomer and at least one comonomer having a polymerizable vinyl group, where the comonomer has no more than one pendant substituent per vinyl carbon. The drag reducing compositions can have improved dissolution rates in hydrocarbon-containing fluid to decrease the pressure drop associated with the turbulent flow of the hydrocarbon-containing fluid through a conduit.</p>                                                                                                                                                      |                                                                                                                                                                           |                    |               |                                                                                                       |                 |
|                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                       |                                                                                                                                                                           |                    |               |                                                                                                       |                 |
| 5.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        | <a href="#">Hydrate inhibited latex flow improver</a>                                                                                                                     | WO2008014190       | 2006-07-28    | CONOCOPHILLIPS<br>CONOCOPHILLIPS<br>LIQUIDPOWER SPECIALTY<br>PRODUCTS*                                | 99 %            |
| <p>A system for reducing pressure drop associated with turbulent fluid flow through subsea conduits. Such reduction in pressure drop is accomplished by transporting a hydrate inhibited drag reducer through a long conduit of small diameter, and thereafter injecting the drag reducer into a host fluid at the subsea location, to make a treated fluid. The treated fluid is then extracted from the subsea location via a production/transportation conduit. The presence of the drag reducer in the treated fluid reduces pressure drop associated with flow through the production/transportation conduit.</p>                                                                                    |                                                                                                                                                                           |                    |               |                                                                                                       |                 |
|                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                      |                                                                                                                                                                           |                    |               |                                                                                                       |                 |
| 6.                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                        | <a href="#">Drag reducing composition</a>                                                                                                                                 | CN103937062        | 2013-03-08    | FLOWCHEM*<br>FLOWCHEM SUCCESSOR BY<br>MERGER TO FLOWCHEM                                              | 99 %            |
| <p>A drag reducing composition comprising a finely divided, solid polyolefin friction reducing agent formed from olefins containing from 2 to 30 carbon atoms, the polyolefin drag reducing agent suspended in a suspending medium and comprising 2,2,4-trimethyl-1,3-pentanediol monoisobutyrate containing up to 10% by weight of water.</p>                                                                                                                                                                                                                                                                                                                                                            |                                                                                                                                                                           |                    |               |                                                                                                       |                 |
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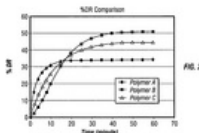
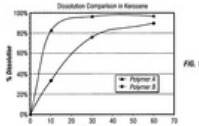
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|-----|----------------------------------------------|--------------|------------|----------------------------------------------------------------------------------------|------|---------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------------|
| 7.  | Downhole flow improvement                    | US2007284110 | 2006-06-08 | CONOCOPHILLIPS*                                                                        | 99 % |                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                                    |
| 8.  | Fuel additive composition                    | GB201400705  | 2013-12-12 | FUEL ADDITIVE SCIENCE TECHNOLOGIES*                                                    | 99 % | <p>The present invention relates to fuel additive compositions and additised fuels. In particular, the invention relates to additives for kerosene used in domestic oil-fired boilers. The fuel additive compositions of the invention include a dispersant; a demulsifier; a metal deactivator; and an antioxidant. Together these ingredients bring a range of instantaneous benefits, including enhanced fuel performance, reduced deposits, improved fuel economy/fuel consumption and reduced emissions.</p>                                                                                  |
| 9.  | Remote delivery of latex drag-reducing agent | US2006144595 | 2004-12-30 | CONOCOPHILLIPS LIQUIDPOWER SPECIALTY PRODUCTS* LUBRIZOL SPECIALTY PRODUCTS PHILLIPS 66 | 99 % | <p>Latex drag reducers and systems for delivering latex drag reducers are disclosed. The latex drag reducers comprise a polymer that is formed via an emulsion polymerization reaction dispersed in a continuous phase and can undergo subsequent modification in order to increase the solubility of the polymer in hydrocarbons. The polymers generally present a particle size of less than about 1000 nm and are suitable for delivery to a subsea flowline via a small diameter conduit of an umbilical line without an unacceptable level of pressure drop or plugging of the conduit.</p>  |
| 10. | High polymer content hybrid drag reducers    | WO2009055112 | 2007-10-26 | CONOCOPHILLIPS LIQUIDPOWER SPECIALTY PRODUCTS* LUBRIZOL SPECIALTY PRODUCTS             | 99 % | <p>A drag reducing composition comprising particles of at least two different drag reducing polymers. The different drag reducing polymers can be formed by different processes, such as bulk polymerization or emulsion polymerization, and the particles of the different drag reducing polymers can have different mean particle sizes. The drag reducing compositions can be added to a hydrocarbon-containing fluid to decrease the pressure drop associated with the turbulent flow of the hydrocarbon-containing fluid through a conduit.</p>                                             |
| 11. | Drag reduction of asphaltenic crude oils     | US2012000544 | 2011-08-12 | LIQUIDPOWER SPECIALTY PRODUCTS*                                                        | 98 % | <p>A process for preparing a drag reducing polymer which is to be added to a liquid hydrocarbon. The liquid hydrocarbon has an asphaltene content of at least about 3 weight percent and an API gravity of less than about 26°. The drag reducing polymer can comprise the residues of a monomer having at least one heteroatom. Treatment of the liquid hydrocarbon with the drag reducing polymer allows a reduction in pressure drop associated with turbulent flow of the liquid hydrocarbon through a conduit.</p>                                                                          |

The present invention relates to additive compositions and to the use thereof for improving the cold properties of fuels and combustibles. The additive compositions comprise at least one modified alkylphenol-aldehyde resin and at least one filterability additive chosen from: terpolymers of C4 to C22 alkyl (meth)acrylate, of C20 to C24 alpha-olefin and of maleimide N-substituted with a hydrocarbon-based chain containing between 4 and 30 carbon atoms, C1 to C40 alkyl (meth)acrylate homopolymers, preferably poly(C8 to C24 alkyl acrylates), and ammonium salts of a monocarboxylic or polycarboxylic acid comprising at least one linear or branched and saturated or unsaturated hydrocarbon-based chain and containing between 4 and 30 carbon atoms. The present invention also relates to compositions of liquid hydrocarbon-based fuels or combustibles comprising such compositions.

C<sub>T1</sub> à C<sub>T5</sub> et C<sub>1</sub> à C<sub>6</sub>

|     |                                                                         |              |            |               |      |
|-----|-------------------------------------------------------------------------|--------------|------------|---------------|------|
| 13. | Combination of polymer slurry types for optimum pipeline drag reduction | WO2006138113 | 2006-06-06 | BAKER HUGHES* | 98 % |
|-----|-------------------------------------------------------------------------|--------------|------------|---------------|------|

A method of extending or broadening the effective time of drag reduction for a drag reducing agent in a pipeline may be custom-designed by combining two drag reducing slurries or other drag reducing products made by different or alternative techniques. For instance a precipitation polymer slurry derived from polymer precipitation where the polymer dissolves relatively quickly can be combined with a ground polymer slurry derived by grinding bulk polymer (ground at either cryogenic or non-cryogenic temperatures), or by using other size reduction techniques, where the latter polymer dissolves relatively slowly. In one non-limiting embodiment of the invention, bulk polymer may be ground directly into a precipitation polymer slurry to make the ground polymer slurry and blend the slurries simultaneously, where the precipitation polymer slurry serves as an anti-agglomeration agent.



|     |                             |              |            |                                                                                                    |      |
|-----|-----------------------------|--------------|------------|----------------------------------------------------------------------------------------------------|------|
| 14. | Additives for reducing drag | US2012123019 | 2011-11-02 | CONOCOPHILLIPS<br>LIQUIDPOWER SPECIALTY<br>PRODUCTS<br>LUBRIZOL SPECIALTY PRODUCTS*<br>PHILLIPS 66 | 98 % |
|-----|-----------------------------|--------------|------------|----------------------------------------------------------------------------------------------------|------|

A composition comprising a drag reducing latex formulation produced by emulsion polymerization to create solid particles dispersed in an aqueous medium and an additive. The use of the composition results in a decrease of film formation while injected through a pump head when compared to the drag reducing latex formulation injected through the pump head.

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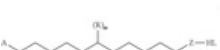
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|-----|----------------------------------------------------------------------------------------------------------------------------------------|-----------|------------|-------|------|
| 15. | Use of a hydrocarbyl-substituted dicarboxylic acid for improving or boosting the separation of water from fuel oils and gasoline fuels | CA2917934 | 2014-07-02 | BASF* | 98 % |
|-----|----------------------------------------------------------------------------------------------------------------------------------------|-----------|------------|-------|------|

Use of a hydrocarbyl-substituted dicarboxylic acid for improving or boosting the separation of water from fuel oils and gasoline fuels which comprise additives with detergent action. A Fuel additive concentrate comprising the said hydrocarbyl-substituted dicarboxylic acid, certain additives with detergent action and optionally other customary additives and solvents or diluents.

# Ultravis®

|     |                                                               |              |            |                                                          |      |
|-----|---------------------------------------------------------------|--------------|------------|----------------------------------------------------------|------|
| 16. | Drag reducing compositions and methods of manufacture and use | WO2009151576 | 2009-06-09 | FLOWCHEM*<br>FLOWCHEM SUCCESSOR BY<br>HERNANDEZ FLOWCHEM | 98 % |
|-----|---------------------------------------------------------------|--------------|------------|----------------------------------------------------------|------|

A drag reducing composition comprising a primary polyolefin obtained by polymerizing mono-olefins containing from about 2 to about 30 carbon atoms, and a surfactant having an HLB in the range of 6.5 to 8.5 in an aqueous suspending media.



|     |                                      |              |            |                                |      |
|-----|--------------------------------------|--------------|------------|--------------------------------|------|
| 17. | Drag-reducing copolymer compositions | US2012035085 | 2008-11-10 | FLOTEK CHEMISTRY*<br>PNC BANK* | 98 % |
|-----|--------------------------------------|--------------|------------|--------------------------------|------|

A method of preparing and using a drag-reducing composition in a well treatment operation includes the step of preparing the drag-reducing composition by mixing a polymer emulsion that includes a first surfactant and a first solvent, with a second surfactant and a second solvent. The method continues with the step of combining the drag-reducing composition with an aqueous treatment fluid. The method further includes the step of injecting the drag-reducing composition and aqueous treatment fluid into a subterranean formation, a pipeline or a gathering line.



|     |                                                     |              |            |                                                                                     |      |
|-----|-----------------------------------------------------|--------------|------------|-------------------------------------------------------------------------------------|------|
| 18. | Disperse non-polyalphaolefin drag reducing polymers | WO2009055114 | 2007-10-26 | CONOCOPHILLIPS<br>LIQUIDPOWER SPECIALTY<br>PRODUCTS*<br>LUBRIZOL SPECIALTY PRODUCTS | 98 % |
|-----|-----------------------------------------------------|--------------|------------|-------------------------------------------------------------------------------------|------|

A drag reducer, comprising non-polyalphaolefin polymer particles dispersed in a carrier fluid comprising a liquid that is a non-solvent for the polymer particles, wherein the particles have an average particle size in the range of from 5 to 800  $\mu\text{m}$ , a D 10 particle size of 0.5-15 $\mu\text{m}$ , a D 50 particle size of 10-90 $\mu\text{m}$ , and a D 90 particle size of 80-170 $\mu\text{m}$ ; and wherein the polymer has a weight average molecular weight of at least  $1 \times 10^6$  g/mol. A method for reducing drag in a pipeline comprises introducing the drag reducer into a hydrocarbon-containing fluid to thereby form a treated hydrocarbon-containing fluid; and flowing said treated hydrocarbon-containing fluid through a pipeline.



|     |                                                                                                                                                        |              |            |       |      |
|-----|--------------------------------------------------------------------------------------------------------------------------------------------------------|--------------|------------|-------|------|
| 19. | Use of a hydrocarbyl-substituted dicarboxylic acid for improving or boosting the separation of water from fuel oils which comprises detergent additive | WO2014146928 | 2014-03-11 | BASF* | 98 % |
|-----|--------------------------------------------------------------------------------------------------------------------------------------------------------|--------------|------------|-------|------|

Use of a hydrocarbyl-substituted dicarboxylic acid for improving or boosting the separation of water from fuel oils which comprise additives with detergent action. A Fuel additive concentrate comprising the said hydrocarbyl-substituted dicarboxylic acid, certain additives with detergent action and optionally dehazers, cetane number improvers and solvents or diluents.

# Tolad®

|     |                                                      |             |            |                 |      |
|-----|------------------------------------------------------|-------------|------------|-----------------|------|
| 20. | Drag reducing copolymers for cold fluid applications | CN104806887 | 2009-06-23 | CONOCOPHILLIPS* | 98 % |
|-----|------------------------------------------------------|-------------|------------|-----------------|------|

Drag reducing compositions comprising polymer particles, where the polymer particles include copolymers comprising the residues of at least one methacrylate monomer and a comonomer having a polymerizable vinyl group, where the comonomer has no more than one pendant substituent per vinyl carbon. The drag reducing compositions can have low dissolution rates in hydrocarbon-containing fluids. The drag reducing compositions can be added to a hydrocarbon-containing fluid to decrease the pressure drop associated with the turbulent flow of the hydrocarbon-containing fluid through a conduit.



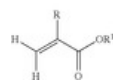
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| 21. | Modified alkyl-phenol-aldehyde resins, use thereof as additives for improving the properties of liquid hydrocarbon fuels in cold conditions | CA2817401 | 2010-12-23 | TOTAL MARKETING SERVICES* | 98 % |
|-----|---------------------------------------------------------------------------------------------------------------------------------------------|-----------|------------|---------------------------|------|

The present invention relates to novel alkyl-phenol-aldehyde resins modified with one or more alkylamines, preferably with at least one primary amine grouping, as well as to the use thereof for improving the flow properties of hydrocarbon fuels, in particular such as jet fuel, diesel fuel, heating gas oil, and heavy fuel oil.

**Noram®**

|     |                                                                                             |           |            |                                                                                            |      |
|-----|---------------------------------------------------------------------------------------------|-----------|------------|--------------------------------------------------------------------------------------------|------|
| 22. | Cold flow improver with broad applicability in mineral diesel, biodiesel and blends thereof | CA2899444 | 2014-02-03 | EVO NEW OIL DISCOVERY TIMES<br>ACTION JEEVES<br>EVONIK INDUSTRIES<br>EVONIK OIL ADDITIVES* | 98 % |
|-----|---------------------------------------------------------------------------------------------|-----------|------------|--------------------------------------------------------------------------------------------|------|

The present application relates to compositions comprising at least one polyalkyl(meth)acrylate polymer, a graft copolymer comprising a copolymer based on ethylene as graft base and one or more polyalkyl(meth)acrylate polymer(s) grafted thereon, and at least one non-grafted ethylene-based copolymer, as well as to the use of such compositions to improve the performance, especially the cold flow properties and injector nozzle coking tendency of middle distillates, especially diesel fuels, biodiesel and blends thereof.



(1)

|     |                                                                                    |           |            |                      |      |
|-----|------------------------------------------------------------------------------------|-----------|------------|----------------------|------|
| 23. | Composition and method for reducing hydrocarbon friction and drag in pipeline flow | CA2875280 | 2013-05-21 | GREEN SOURCE ENERGY* | 98 % |
|-----|------------------------------------------------------------------------------------|-----------|------------|----------------------|------|

A method and composition for reducing drag, reducing friction, reducing viscosity, and/or improving flow of viscous hydrocarbons including adding an effective amount of a drag-reducing composition containing a blend of turpentine liquids to a viscous hydrocarbon storage or pipeline operation and forming a drag-reducing mixture of viscous hydrocarbons and the blend of turpentine liquids.

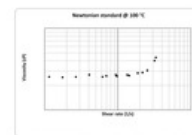
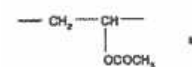
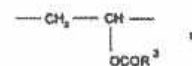


Fig. 1

|     |                                                                  |          |            |           |      |
|-----|------------------------------------------------------------------|----------|------------|-----------|------|
| 24. | Process and product to improve cold flow properties of fuel oils | NO990291 | 1998-01-24 | CLARIANT* | 98 % |
|-----|------------------------------------------------------------------|----------|------------|-----------|------|

An additive comprising a mixture of (A) 15-50 wt.% of a copolymer containing, apart from 87-92 mol.% structural units derived from ethylene, (a) 6.5-12 mol.% units derived from vinyl acetate and (b) 0.5-6 mol.% units derived from 4-methyl pentene-1, with the proviso that the sum of (a) and (b) is 8-14 mol.%, and (B) 85-50 wt.% of a further copolymer or terpolymer of ethylene and vinyl esters or acrylic acid esters. Process for improving the cold flow properties of oils containing less than 500 ppm sulfur and at least 8 wt.% n-paraffins of chain length of 18C or longer comprises adding an additive comprising a mixture of (A) 15-50 wt.% of a copolymer containing, apart from 87-92 mol.% structural units derived from ethylene, (a) 6.5-12 mol.% units derived from vinyl acetate and (b) 0.5-6 mol.% units derived from 4-methyl pentene-1, with the proviso that the sum of (a) and (b) is 8-14 mol.%, and (B) 85-50 wt.% of a further copolymer or terpolymer of ethylene and vinyl esters or acrylic acid esters.



|     |                                                                                   |           |            |               |      |
|-----|-----------------------------------------------------------------------------------|-----------|------------|---------------|------|
| 25. | Methods and compositions for improvement of low temperature fluidity of fuel oils | US5772706 | 1997-09-12 | BAKER HUGHES* | 98 % |
|-----|-----------------------------------------------------------------------------------|-----------|------------|---------------|------|

Adding to a fuel oil a composition of from about 1 to about 40 parts by weight ethylene/vinyl acetate copolymer having a vinyl acetate content of from about 10% by weight to about 50% by weight and a weight average molecular weight of from about 2,000 to about 10,000, and 1 part by weight esterified copolymer of at least one generally linear alpha-olefin of from about 18 to about 50 carbon atoms and maleic anhydride in an alpha-olefin to maleic anhydride molar ratio of from about 4:1 to about 1:2, the copolymer having a weight average molecular weight of from about 2,000 to about 20,000, the esterified copolymer having been esterified with a plurality of aliphatic alcohols having from about four to about forty carbon atoms, imparts to the fuel oil surprisingly improved low temperature fluidity, provided that the alcohols include an eight carbon alcohol making up from about 50 to about 85 molar percent of the alcohols.