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15. Supplementary Notes (Funding programs, titles of related publications, etc.) Several research reports for testing of de/anti-icing technologies were produced for previous winters on behalf of Transport Canada. These are available from the Transportation Development Centre (TDC). Several reports were produced as part of this winter's research program. Their subject matter is outlined in the preface. This project was co-sponsored by the Federal Aviation Administration.					
16. Abstract The objective of the tests conducted during the winter of 2009-10 was to evaluate ice phobic coatings, specifically their effect on de/anti-icing fluid holdover time (HOT) and their ability to protect surfaces from the accumulation of winter contamination. Testing conducted was limited and preliminary due to limited funding available, and as a result, only a limited number of products were tested in each condition. <u>Wind Tunnel Testing Results</u> : Adhered contamination on the ice phobic treated strips was more easily removed as compared to the untreated surfaces, however, most of the adhered contamination was not eliminated at the time of rotation. <u>Adherence Testing Results</u> : Similar levels of adherence were observed on all surfaces during the simulated light freezing rain test. <u>Fluid Wetting and Fluid Thickness Testing Results</u> : Preliminary tests have indicated that some products demonstrated minimal to no reduction in wetting and fluid thickness. <u>Fluid Endurance Time Testing Results</u> : Testing indicated that some ice phobic products demonstrated limited reductions to fluid endurance time. <u>General Observations</u> : Ice phobic products are not an appropriate stand-alone substitute for de/anti-icing as they do not necessarily prevent freezing and adhesion of contamination. Based on the preliminary results observed, an ice phobic treated aircraft surface is not a suitable alternative to de/anti-icing, but a combination of ice phobic treated aircraft surfaces and de/anti-icing may be possible. <u>Recommended Future Work</u> : Potential future work could include cooperating with manufacturers to develop products with maximum phobicity while limiting adverse effects on de/anti-icing fluid HOT's (holdover time related research activity). Testing could also evaluate the potential application of ice phobic products on areas prone to icing but where de/anti-icing protection is limited, or not available, and the potential application of ice phobic products in quiet areas and areas near drain holes to reduce gel residues. If there is a strong industry request to evaluate these products for use in aircraft operations, and Society of Automotive Engineers Inc. (SAE) specification should be developed for the evaluation of these technologies with respect to fluid HOT's.					
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