...STORM SURVEY OVERVIEW OF THE MAY 27 2014 SEVERE THUNDERSTORM IN ADDISON AND RUTLAND COUNTIES...

THE NATIONAL WEATHER SERVICE SURVEY TEAM FOUND THAT THE DAMAGE FROM THE STORM WAS DUE TO STRAIGHT LINE WINDS, LIKELY WITH SMALLER EMBEDDED DOWNBURSTS CAUSING LOCALLY ENHANCED WIND SPEEDS AND ASSOCIATED DAMAGE. THERE WAS NO EVIDENCE OF A TORNADO.

THE AREA IMPACTED BY THE STRONG WINDS WAS RATHER LARGE, ALTHOUGH THE ACTUAL DAMAGE THAT OCCURRED WAS MORE ISOLATED IN NATURE.

THE SURVEY TEAM ESTIMATED THAT WIND GUSTS IN THE 40 TO 60 MPH RANGE WITH SMALL POCKETS OF WINDS IN THE 75 TO 85 MPH RANGE OCCURRED ACROSS A ROUGHLY 3 MILE WIDE AND NEARLY 20 MILE LONG SWATH WHICH STARTED IN BRIDPORT VERMONT NEAR RT 125 AND STRETCHED SOUTHEASTWARD INTO SUDBURY VERMONT. THESE ESTIMATES FIT IN WITH AN OBSERVED GUST TO 74 MPH IN BRIDPORT NEAR THE STARTING POINT OF THE STRONG WINDS.

THE MAJORITY OF THE WIND DAMAGE WAS FROM TOPPLED/UPROOTED TREES, THOUGH A FEW TREES WERE OBSERVED TO HAVE BEEN SNAPPED. IN ADDITION, A 65 FOOT TALL SILO IN BRIDPORT WAS SEVERELY DAMAGED AND A UTILITY POLE IN CORNWALL WAS SNAPPED. BASED ON THE DIRECTION THE TREES FELL AND EYEWITNESS ACCOUNTS, THE DAMAGING WINDS ALL WERE FROM A GENERAL NORTHWEST TO NORTH DIRECTION CONSISTENT WITH STRAIGHT LINE WINDS.

AS THE STORM MOVED SOUTHEAST OF SUDBURY AND ACROSS PROCTOR AND RUTLAND, THE WINDS ASSOCIATED WITH THE THUNDERSTORM GREATLY DIMINISHED, WITH VERY MINIMAL WIND DAMAGE BEING OBSERVED IN THESE AREAS.

WHAT IS PROBABLY MOST STRIKING ABOUT THIS STORM WAS THE NEARLY CONTINUOUS SWATH OF HAIL -- BOTH LARGE IN SIZE AND AMOUNT THAT FELL. THE HAIL SWATH WAS ABOUT 30 TO 35 MILES IN LENGTH, STARTING IN BRIDPORT AND CONTINUING TO SOUTH OF RUTLAND. IT IS QUITE LIKELY THAT THE DAMAGE COST FROM THIS STORM WILL BE PRIMARILY DUE TO THE HAIL DAMAGE.

HAIL AS LARGE AS GOLF BALLS (1.75" IN DIAMETER) WERE REPORTED THROUGHOUT THE PATH OF THE STORM, WITH DIME TO QUARTER SIZE (1" DIAMETER) BEING MOST COMMON. SEVERAL INCHES OF HAIL ACCUMULATED IN SOME AREAS. IN ADDITION, THE SHEER QUANTITY OF HAIL CAUSED A CONSIDERABLE AMOUNT OF TREE LEAF DAMAGE -- WITH THE WORST OF THIS BEING OBSERVED IN PROCTOR VERMONT. IN RUTLAND, THE HAIL CAUSED DAMAGE TO CARS AND WINDOWS. HAIL WAS STILL OBSERVED ON THE GROUND ALMOST 24 HOURS AFTER THE STORM IN CORNWALL.

VERY HEAVY RAIN ALSO OCCURRED WITH THIS STORM, WITH ONE UNOFFICIAL REPORT OF 1.8" IN LESS THAN 1 HOUR IN CORNWALL. THE SURVEY TEAM OBSERVED SIGNS OF MINOR ROAD WASHOUTS AND EVIDENCE OF SMALL STREAM FLOODING HAVING OCCURRED AS WELL.

THE THUNDERSTORM RESPONSIBLE FOR ALL THE DAMAGE INITALLY DEVELOPED OVER THE ADIRONDACKS AROUND 230PM AND QUICKLY BECAME SEVERE AS IT MOVED SOUTHEAST AND REACHED VERMONT ABOUT 330PM. THE THUNDERSTORM FINALLY DISSIPATED AS IT MOVED INTO EXTREME SOUTHERN VERMONT ABOUT 600PM. THIS TYPE OF THUNDERSTORM WHICH PERSISTS FOR SEVERAL HOURS AND PRODUCES DAMAGE ALONG IT'S TRACK IS CALLED A SUPERCELL.