

the reflux of sterile bile under such conditions does produce pancreatitis, such cause for the condition must be very rare; few cases are on record. A reflux of bile could not have been the cause in any of our cases of acute pancreatitis. It should be noted that any mechanism which will afford the possibility for bile to pass into the pancreatic duct will also obstruct the flow of pancreatic juice. Furthermore, bile has been found in the pancreatic duct without acute pancreatitis. Pathologists should, in all cases of pancreatitis, examine the relationship of the two ducts to the duodenum and to each other in order to determine if it is anatomically possible for bile to pass into the pancreatic duct. Our data conclusively prove that we must look elsewhere for the explanation of the cause of most cases of pancreatitis.

171 (1918)

A rapid method for the determination of the moisture content of expressed plant-tissue fluids.

By ROSS AIKEN GORTNER and WALTER F. HOFFMAN.

[From the Division of Agricultural Biochemistry, University of Minnesota, St. Paul, Minn.]

The moisture content of expressed plant saps can be measured by determining the refractive index of the sap using an Abbé refractometer provided with a special "sugar scale."

In a series of determinations we have found that more accurate results can be obtained by the refractometric method than can be obtained by drying weighed portions of the saps in a vacuum oven. The results are fully as accurate as are those obtained by drying in vacuo at room temperature over sulfuric acid.

The great advantage of the method lies in the fact that only 2 or 3 drops of sap are necessary and that the entire time of measurement need not exceed two minutes.

It appears probable that the method may be applied to other biological fluids. A more extended account of the method will appear in a botanical journal.