

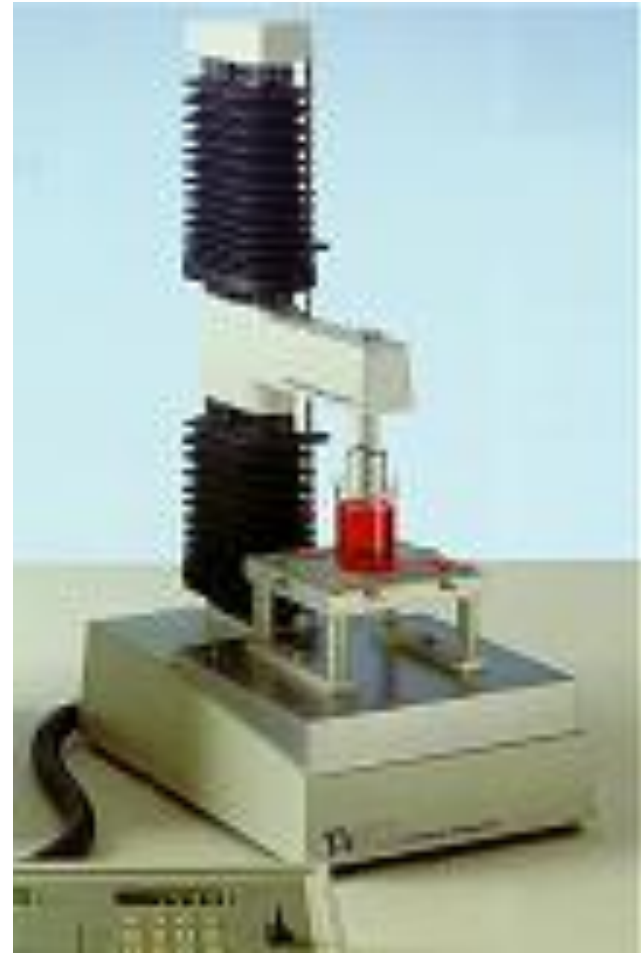
# Examples of Methods Used

S. Barbut

University of Guelph

# Methods

- Textural Profile Analysis (TPA)
  - Hardness
  - Cohesiveness
  - Guminess
  - Chewiness
  - Adhesiveness
  - Springiness



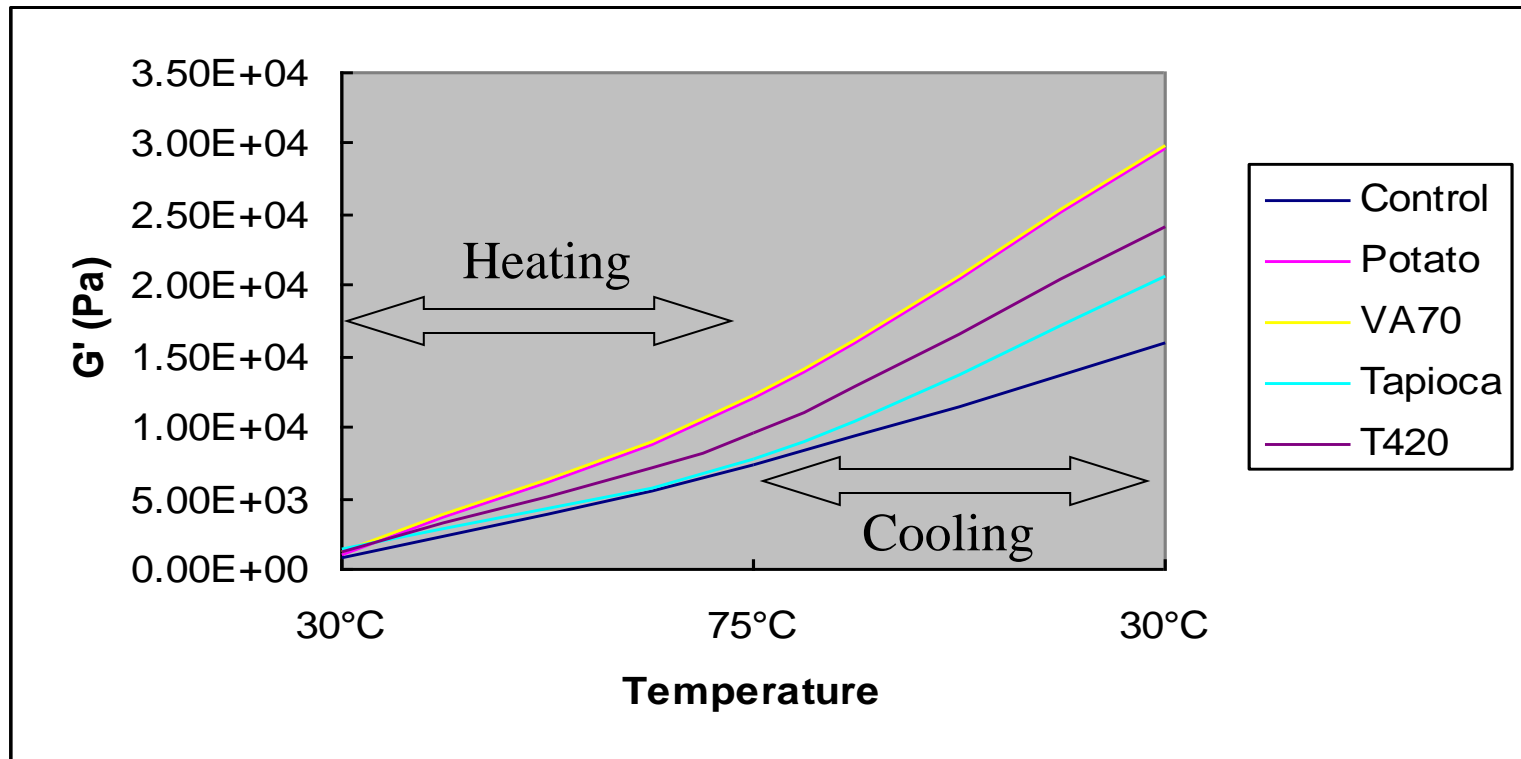
# Methods

- Rheological Characteristics
  - Elastic Modulus ( $G'$ )
  - Viscous Modulus ( $G''$ )



# Rheology: Changes of Elastic Modulus ( $G'$ ) with Temperature

## Studying the Pale, Soft & Exudative Poultry Meat



## Light Microscopy of Acidified Meat Products

a- Control

b- Encap. Citric

(Note: less than ideal binding)

c- Encap. Lactic

(Note: less than ideal binding)

d- Encap. GDL

(Note: less than ideal binding)

e- Liquid Lactic Acid

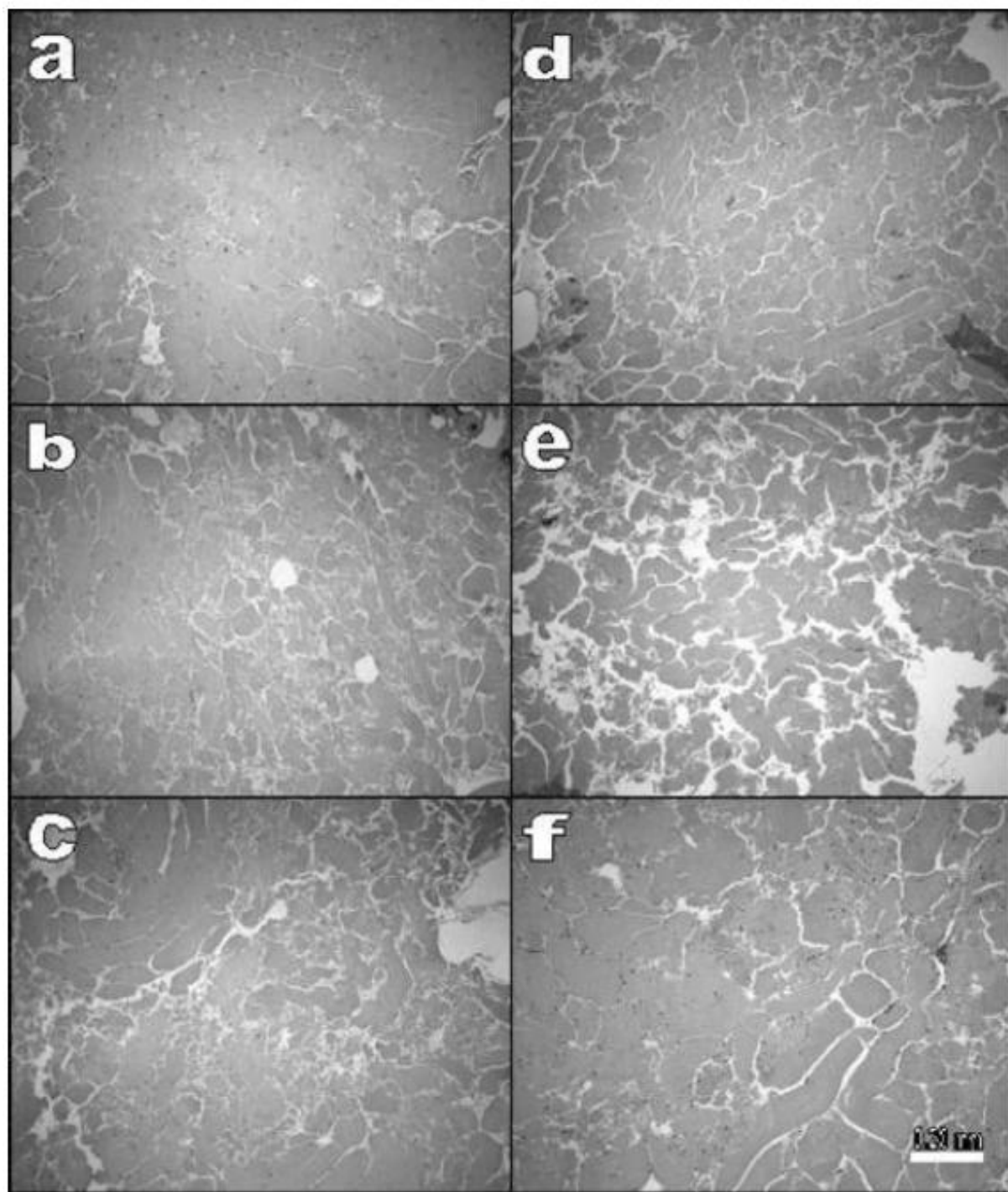
(Note: poor binding due to premature protein denaturation)

f- Lactic Acid Bacteria

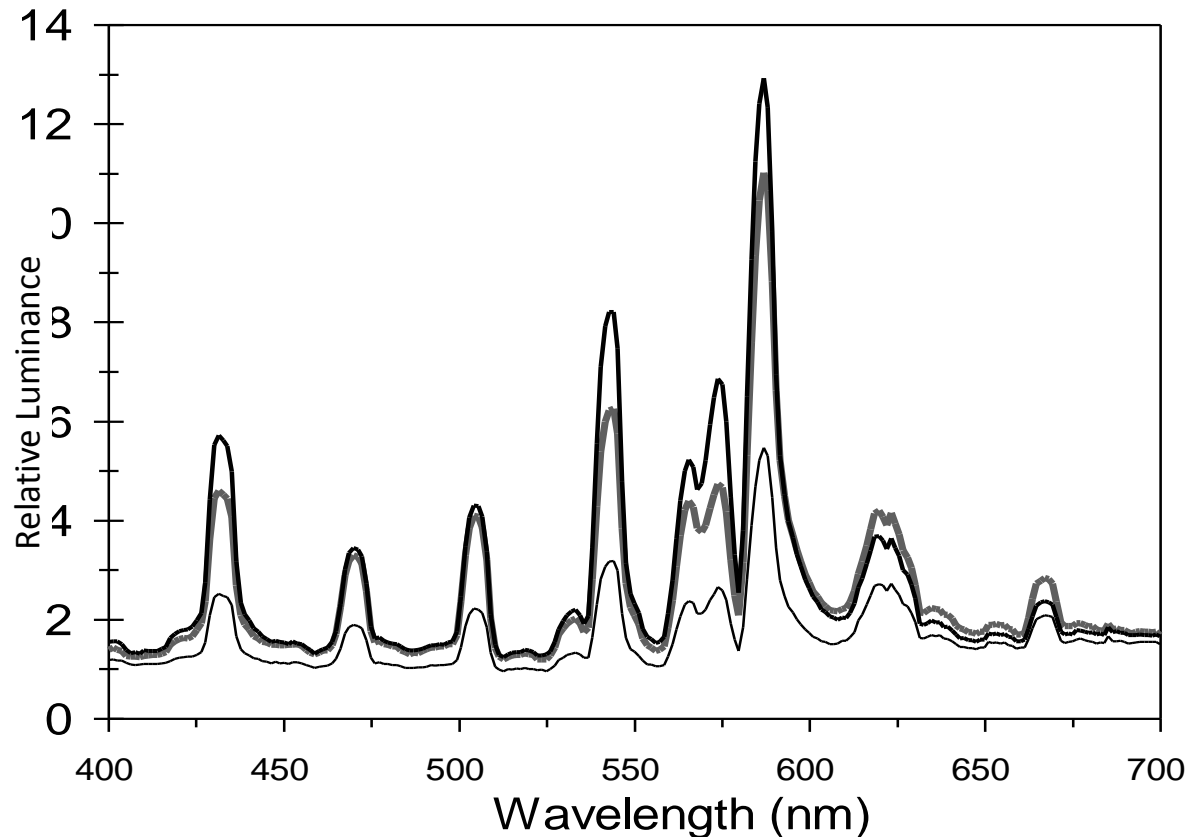
(Note: high count of LAB)

Bar = 0.2 mm

Barbut - J. Muscle Food

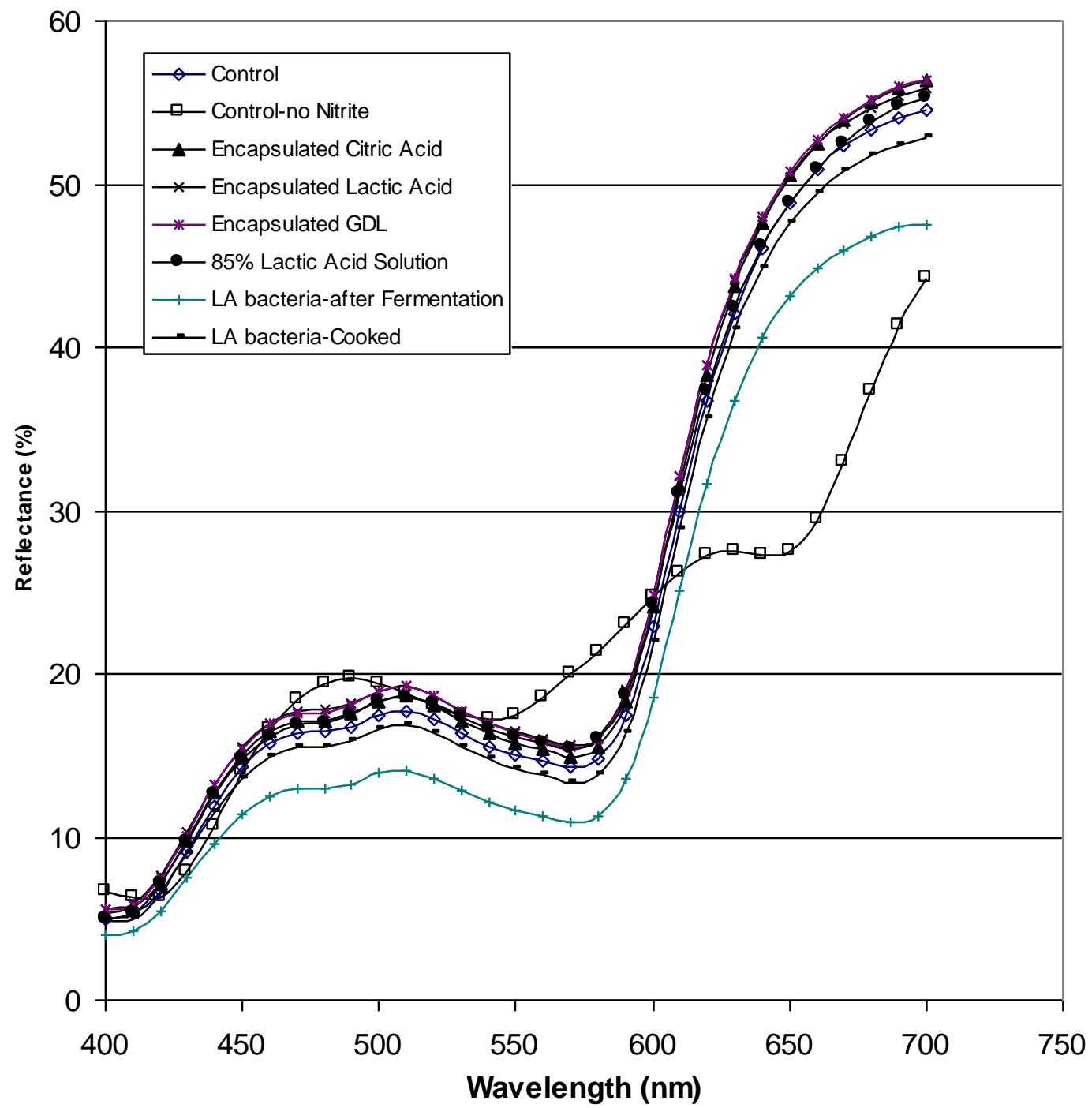


# Use of Fiber Optic Probes: Relative Luminance Curves of Fermented Sausages Presented Under Metal Halide Light at 760 Lux



— Summer Sausage    — Genoa —  
Cappola

# Color Measurements Spectra Data of Acidified Meat Products

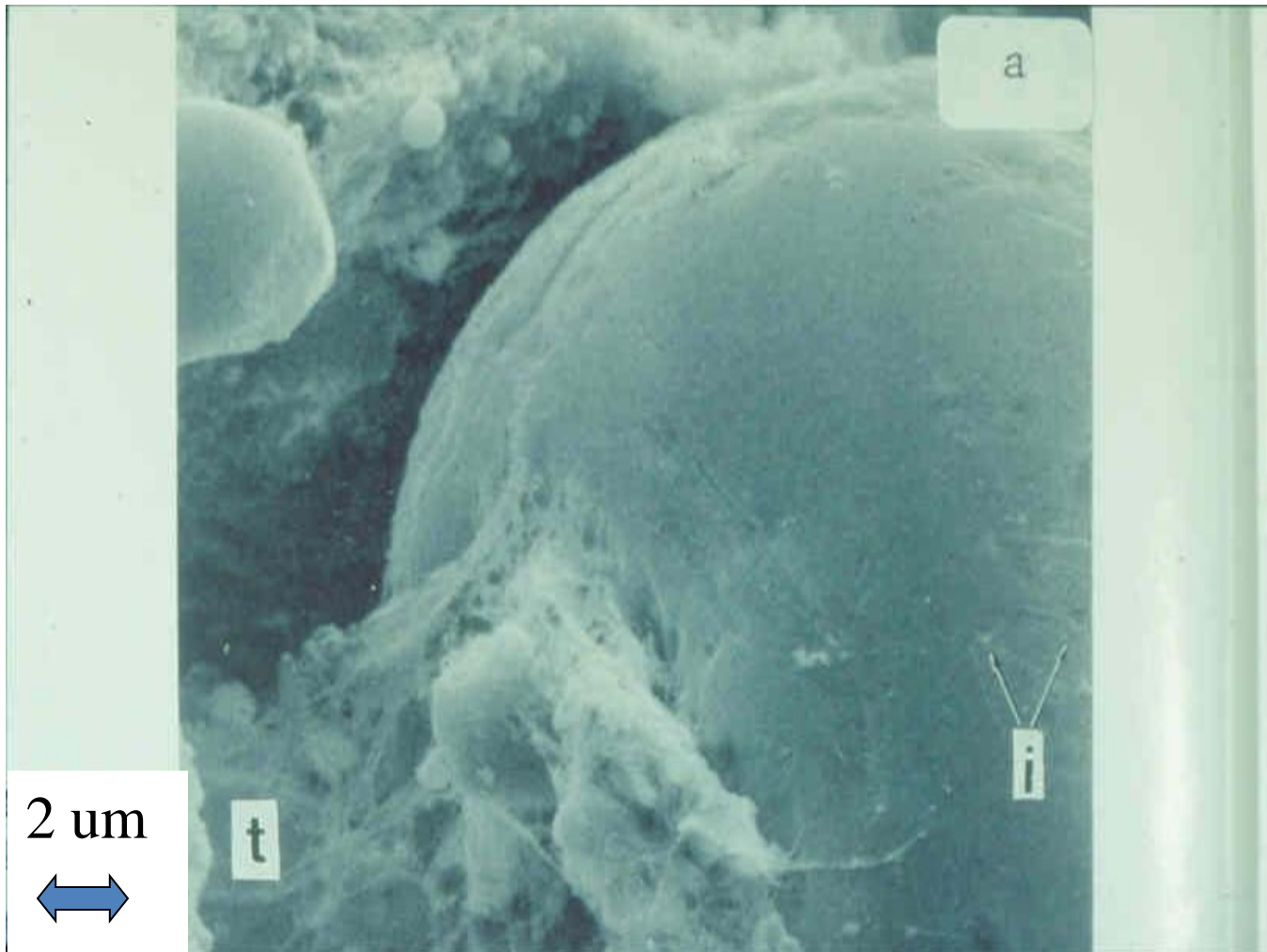


# Gel Electrophoresis

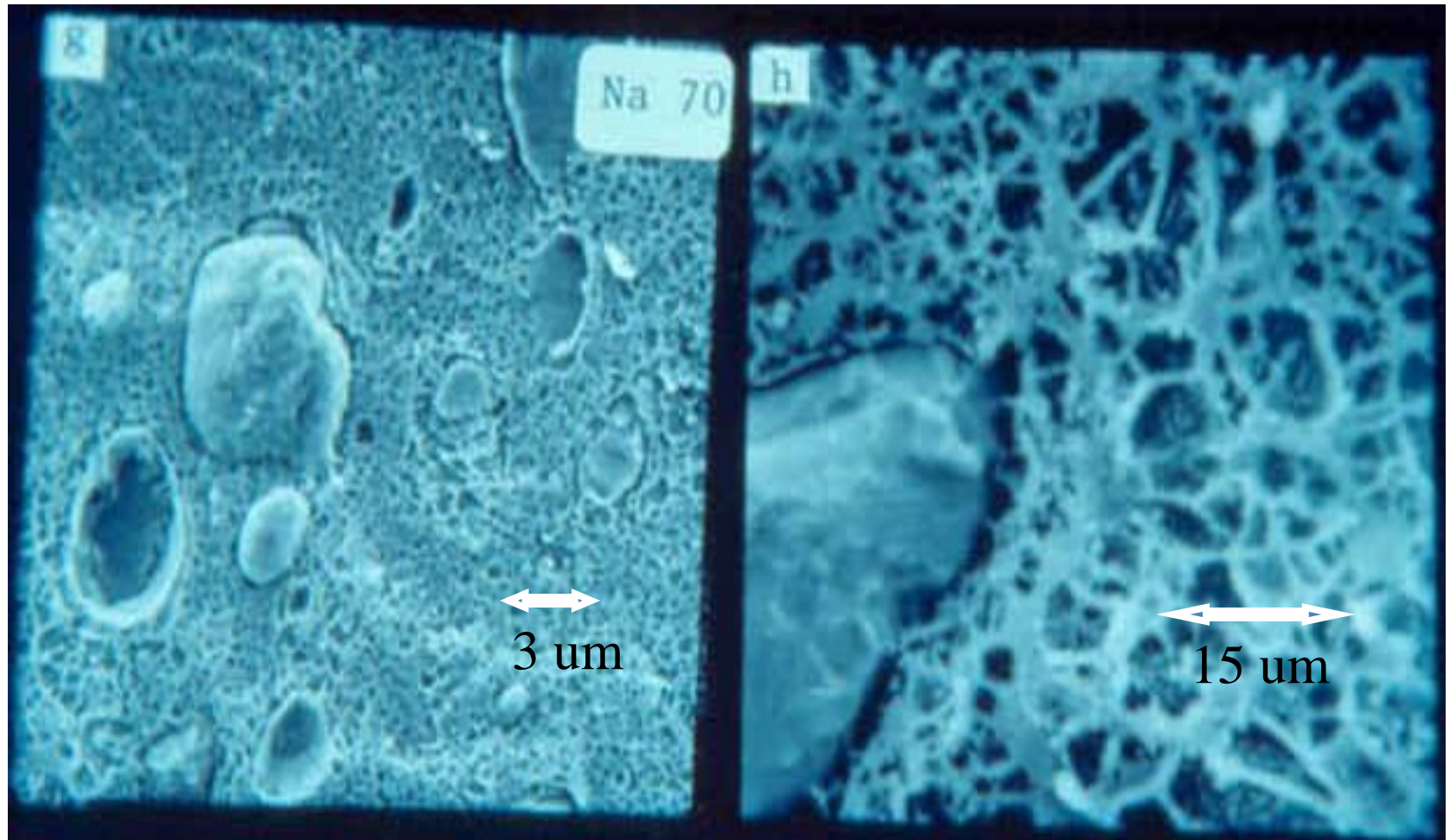




# Conventional Electron Microscopy (fat dispersion in a meat product)



# Cryo Scanning Electron Microscopy (fat dispersion in a meat products with salt and phosphate)



# Use of Hydrocolloid Gums



Kappa 1 2 3

2%

SB-273

tota