Widefield Retinal Imaging

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CMV Patient
Same Patient, Same Day

Images Courtesy of Mat MacCumber, MD, Rush University
The P200° MA

Ultra-widefield, ultra-high resolution, simultaneous imagery

Red, Green and Blue Scanning Lasers

- 633nm
- 532nm
- 488nm

Vitreous
Retina
RPE
Choroid
Sclera
ResMax® = 100° image with a resolution of 11µm
+4 Cortical Cataract
Considerations

- Clinic issues
  - Location
  - Effect on Flow
  - Opportunity Cost in Space, Dollars
- People issues
  - Photographer use/ease
  - Patient use/ease
- Image interaction – software
- Clinical Utility
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• Clinical Utility
Case 1: Retinal Vascular DM. Presented with VH/PDR OS.
Case 2: Macular Disease
Case 3: Autofluorescence
Angioid streaks
Case 4: Uveitis
Vasculitis with vitreous hemorrhage
Case 5: Tumors
Case 6: CRVO
Advantages

• Provides a detailed view of the peripheral retina, color, and angiography

• Real-time imaging with angiography

• Easy to use, non-contact, works well with media opacity

• Integrates well with existing hardware, mature software platform


DRCR Protocol AA

• One Optos image appears to give more information than 7 standard ETDRS fields

• Early studies show those patients with peripheral findings progress more rapidly than those without
Thank You
Thank You