

One Year Later:

TARE (Transarterial Radioembolization) in the OIS

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THE NEXT OIS FRONTIER?

SELECTIVE INTERNAL RADIOTHERAPY
Y90 RADIOEMBOLIZATION

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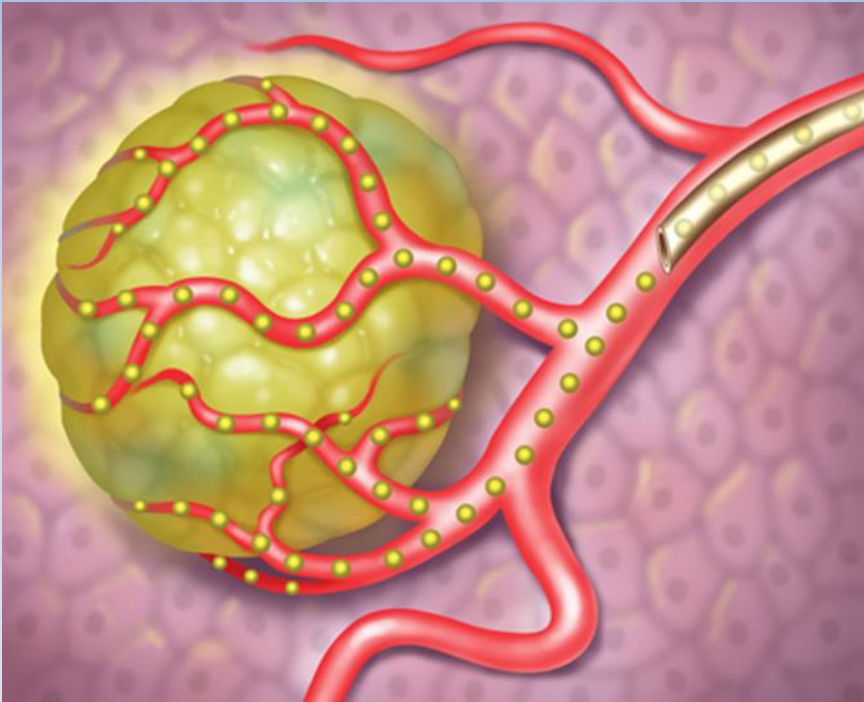
David Sperling MD, FSIR - ColumbiaDoctors

- Interventional Radiologist at Columbia University Irving Medical Center
- Vice Chair, Strategy and Development for the Department of Radiology.
- Columbia Doctors has two separate Office Based Interventional Suites (OBIS) for the Department of Radiology
- Our facilities contain 3-C-Arm suites and perform all elements of outpatient IR, including consultations and procedures
- Since our launch in 2008 our freestanding offices have:
 - Treated over 15,000 patients
 - Performed over 8,000 procedures
 - Performed over 600 chemoembolizations for liver tumors.
 - **Performed 16 TARE procedures (Y90 radioembolizations)**

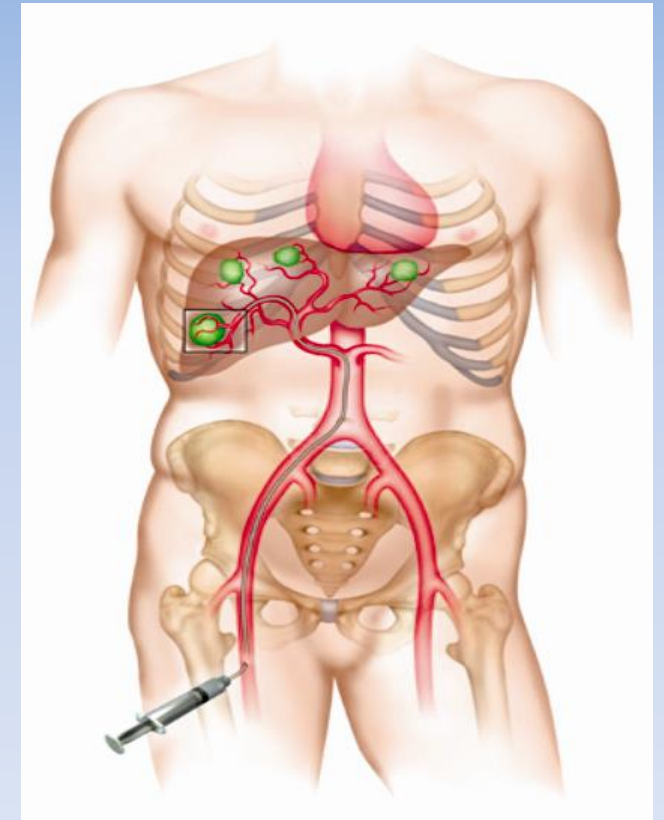


SIRT Selective Internal Radiation Therapy

- SIR-Spheres ® were approved by the FDA in March 2002 for Metastatic Colorectal Cancer Patients in combination with HAC Fudr Chemotherapy



Treatment Goals:
Selectively deliver a tumoricidal dose of beta radiation to the liver tumor while maintaining a low radiation dose to the normal liver tissue



METASTATIC OR PRIMARY LIVER TUMOR TYPES TREATED WITH Y90

COLORECTAL

NEUROENDOCRINE

HEPATOCELLULAR CARCINOMA

CHOLANGIOCARCINOMA

BREAST

PANCREAS

MELANOMA

LUNG

SARCOMA

GIST

STOMACH

SMALL BOWEL

UNKNOWN PRIMARY

UROTHELIAL

OVARY

ESOPHAGUS

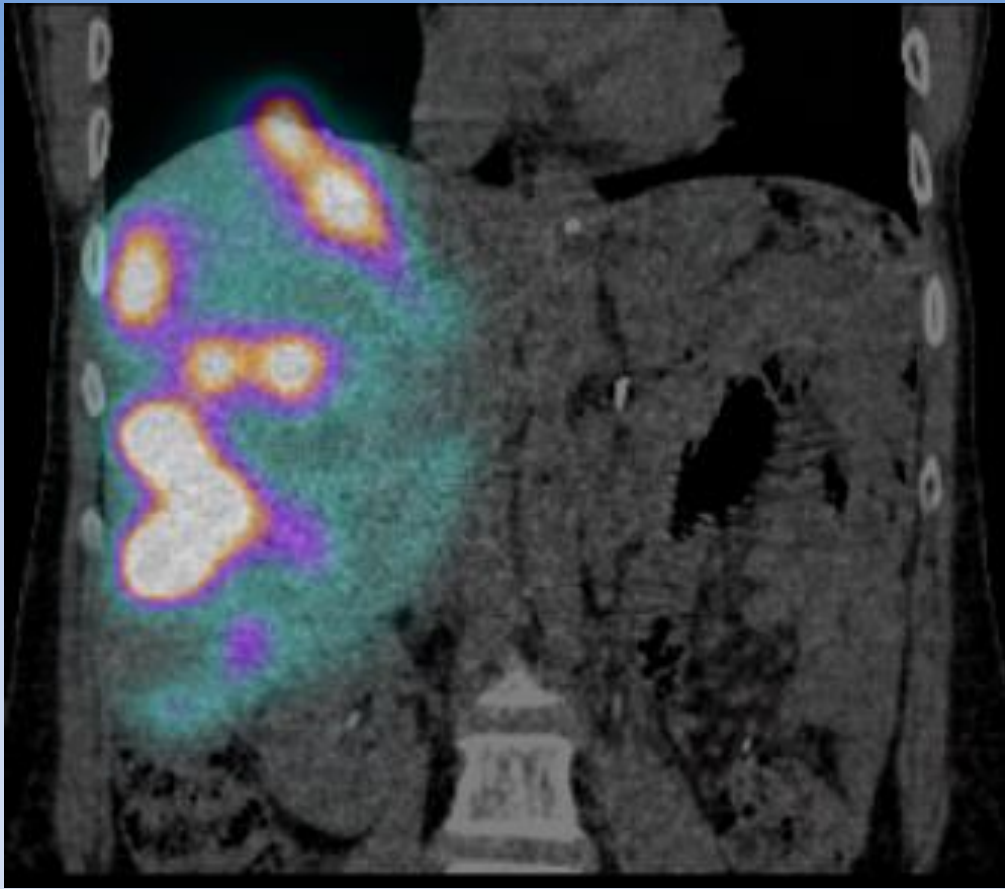
RENAL

Y90 TREATMENT SCHEDULE

- Requires (2) outpatient procedures
- 1st procedure is for pretreatment evaluation/mapping
 - Angiogram mapping and embolization
 - Lung shunt study with MAA – CT SPECT scan
 - Base line PET or PET CT (optional)
 - Treatment planning and basic dosimetry
- 2nd procedure is for the Y90 administration
 - Repeat angiogram, possible embolization, administration/insertion of SIR-Spheres with IR/AU
 - Post-treatment Bremsstrahlung







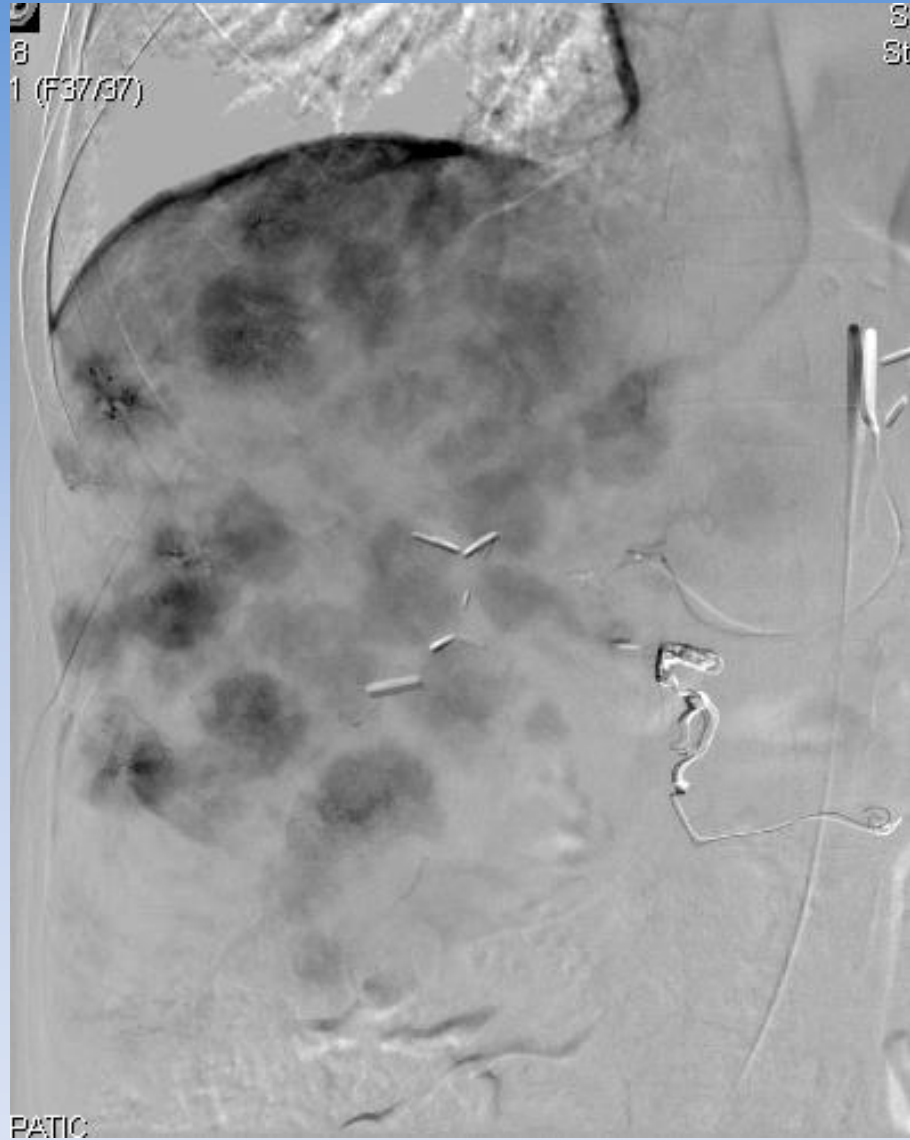
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SO WHY DID WE THINK Y90 WOULD WORK IN THE OIS?

OUTPATIENT PROCEDURE

INSURANCE WILL NOT EVEN CONSIDER PAYMENT AS AN INPATIENT

WELL REIMBURSED

WELL TOLERATED

FATIGUE IS TYPICALLY THE ONLY MAIN SIDE EFFECT

SAFE

2018 non-Facility Payment: One Mapping (National Average: non-facility payments)

Procedure	CPT	Quantity	Reimbursement
Arterial Embolization	37242	1- day of mapping	\$7,474
Selective catheter	36246 36247 36248	Operator determined (pre-treatment & day of treatment)	\$1,341
Diagnostic angiogram	75726 75774	Operator dependent	\$240
Lung shunt imaging	78201 78205	1- day of mapping	\$200
Total – with embolization			\$9,255
Total – <u>without</u> embolization			\$1,781

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2018 non-Facility Payment: One Treatment (National Average: physician non-facility payments)

Procedure	CPT	Quantity	Reimbursement
Arterial Embolization	37243	1- day of treatment	\$9,900
Selective catheter	36247 36248	Operator determined (pre-treatment & day of treatment)	\$921
Treatment Planning	77263	1 – per treatment (prior to Y-90 treatment)	\$171
Basic Dosimetry	77300	1- per treatment	\$69
Y-90 Administration	79445	1- AU	\$117
Bremsstrahlung scan	78201	1- day of mapping	\$200
Total			11,378
HCPCS Q3001 – Brachytherapy Elements Add to line 19 on 1500	Q3001	1- day of treatment	\$16,500

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WHAT NEEDED TO GET DONE IN A YEAR TO DO Y90 IN THE OIS?

- RADIOACTIVE MATERIALS LICENSE
 - applications, facility preparation, city and state inspections
- RADIATION PHYSICS AND SAFETY STAFF
- VENDOR FOR DOSE CALIBRATION AND DELIVERY
- VENDOR FOR Y90 (SIRTEX AND BTG)
- PROCEDURES FOR RADIATION WASTE DISPOSAL
- FIGURE OUT NUCLEAR MEDICINE NEEDS
 - mapping location, delivery location, post delivery imaging
- PREAUTHORIZATION, PREDETERMINATION, CODING, BILLING, COLLECTIONS
- WORKFLOW AND INCORPORATION INTO DAILY SCHEDULES

AT LEAST 3 MONTHS FOR THE RAM LICENSE
CONSTRUCTION/MATERIALS (FOR HOT LAB) (IF NEEDED) (2-3 MONTHS)
POLICY AND PROCEDURES AND INSPECTION (2-3 MONTHS)

FIRST CASE: NOVEMBER 2018

SECOND CASE: DECEMBER 2018

WANTED TO BE SURE PROCESSES WERE CORRECT

EVALUATE FOR COMPLICATIONS

EXAMINE INSURANCE ISSUES INCLUDING REIMBURSEMENT AND PAYMENT FOR
THE DOSE ITSELF

JANUARY 2019-MARCH 2019: 14 CASES

(easy and rapid adoption by all our partners)

5 more cases scheduled for the next 2 weeks

ALL CASES COMPLETED SUCCESSFULLY

DELIVERY AND DOSING STREAMLINED

STORAGE AND WASTE DISPOSAL PERFORMED ON SITE

RADIATION PHYSICS AND SAFETY STAFF HAVE BEEN VERY ACCOMODATING

WE HAVE BEEN GETTING PAID



THANK YOU!