American Association of Physicists in Medicine Annual Meeting 2019

Satisfying the Joint Commission Fluoroscopy Requirements

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Standards Interpretation Group

The Joint Commission

Plan of Attack

Diagnostic Imaging Standards

A. Modifications to original elements of performance
B. Imaging Requirements effective January 1, 2019

Common questions from accredited organizations related to diagnostic imaging

A. Equipment
B. Personnel
C. Policies/Procedures

Requirements for Improvement scored at survey 2018/Q1 2019

A. Over view of data
B. Examples of specific items scored in diagnostic imaging

The Joint Commission

Mission:

- To continuously **improve** health care…
- By **evaluating** health care organizations –
- meaningful assessment
- by discovering unknown risks
- To provide **safe** and effective care
- **Inspiring** them to excel

The Joint Commission

FluoroscopyStandards

Fluoroscopy Standards

- Imaging Requirements effective January 1, 2019
  - Standards Revisions for Organizations Providing Fluoroscopy Service
- Applicable to:
    - Ambulatory health care
    - Office based surgery
    - Critical Access Hospitals
    - Hospitals

How will they be surveyed?

- No changes to the on-site survey agenda
- Compliance will be assessed as part of the current survey activities, (e.g. *EC, Competence Assessment, Data Management)*
- Evaluation of compliance will be incorporated into the current patient tracer processes, file review, patient, provider, staff, and leadership **interviews/discussions**

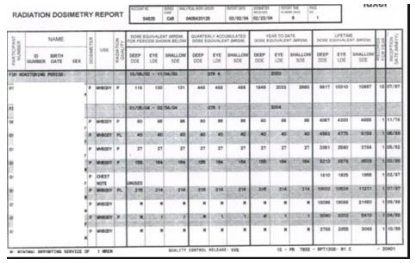
Support Safe Environment of Care:

Management of Risks EC.02.02.01

- EP 7 Minimize risks associated with selection and use of hazardous energy sources.
  - **Effective July 1, 2018**
  - Note 2: This includes the use of proper <<staff>>shielding during fluoroscopic procedures.

Support a Safe Environment of Care

Management of Risks EC.02.02.01


RADIATION DOSIMETRY REPORT

- EP 17 For organizations that provide computed tomography (CT), positron emission tomography (PET), nuclear medicine (NM) or fluoroscopy services: The results of staff dosimetry monitoring are reviewed at least quarterly by the radiation safety officer, diagnostic medical physicist, or health physicist to assess whether staff radiation exposure levels are “as low as reasonably achievable” (ALARA) and below regulatory limits.

Imaging equipment functions properly:

Inspects, tests and maintains medical equipment EC.02.04.03

Effective 01/01/2019

EP 34 For organizations that provide fluoroscopic services: At least **annually,** a diagnostic medical physicist conducts a performance evaluation of fluoroscopic imaging equipment. The evaluation results, along with recommendations for correcting any problems are documented.

TJC Glossary Annually: One year from the date of the last event, plus or minus 30 days. Synonymous with every 12 months, once a year, or every year.

The evaluation includes an assessment of the following:

- Beam alignment and collimation
- Tube potential/kilovolt peak (kV/kVp) accuracy
- Beam filtration (half-value layer)
- High contrast resolution
- Low contrast detectability
- Maximum exposure rate in all imaging modes
- Displayed air-kerma rate and cumulative-air kerma accuracy (when applicable)

Notes…

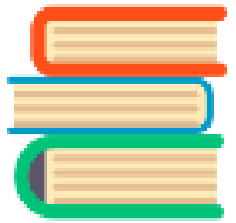
- ✓Note 1: Medical physicists may be assisted by individuals with required training and skills as determined by the physicist.

- ✓This element of performance **does not** apply to fluoroscopy equipment used for therapeutic radiation therapy treatment planning or delivery.

Minimum qualifications, training:

Staff participate in ongoing education and training: HR.01.05.03

- EP 15 Ongoing and annual training for individuals (including physicians, non-physicians and ancillary personnel) who use fluoroscopic equipment:
  - Radiation dose optimization techniques and tools for pediatric and adult patients (Image Gently, Image Wisely)
  - Does not apply to fluoroscopy equipment used for radiation therapy treatment planning or delivery



Based on Focus Groups with experts and stakeholders DSSM addressed the education and competency of fluoroscopy users.

However, we received a great deal of comment indicating

- Annual requirement was too frequent
- Certain physician specialties should be excluded.

Further review within the Joint Commission concluded that there were Elements of Performance already in place that could be used to ensure training and competency in the use of fluoroscopy.

Notifications

- Change in EP posted on 6/17/2019
- August issue of Perspectives

HR. 01.05.03 Staff participate in ongoing education and training.

EP 1 Staff participate in ongoing education and training to maintain or increase their competency and, as needed, when staff responsibilities change. Staff participation is documented.

HR.01.06.01 Staff are competent to perform their responsibilities.

EP 1 The hospital defines the competencies it requires of its staff who provide patient care, treatment, or services. (See also NPSG.03.06.01,EP 3)

EP 3 An individual with the educational background, experience, or knowledge related to the skills being reviewed assesses competence. Note: When a suitable individual cannot be found to assess staff competence, the hospital can utilize an outside individual for this task. If a suitable individual inside or outside the hospital cannot be found, the hospital may consult the competency guidelines from an appropriate professional organization to make its assessment.

EP 5 Staff competence is initially assessed and documented as part of orientation.

EP 6 Staff competence is assessed and documented once every three years, or more frequently as required by hospital policy or in accordance with law and regulation.

Non-Hospital Programs (Ambulatory Health Care- AHC, Office Based Surgery- OBS)

HR.02.01.03 The organization grants initial, renewed, or revised clinical privileges to individuals who are permitted by law and the organization to practice independently.

Before granting initial or revised privileges, the organization uses primary sources when documenting training specific to the privileges requested.

Note 1: The verification of relevant training informs the organization of the licensed independent practitioner's clinical knowledge and skill set. Verification must be obtained from the primary source of the specific credential. Primary sources include the specialty certifying boards approved by the American Dental Association for a dentist's board certification, letters from professional schools (for example, medical, dental, nursing) and letters from postgraduate education or postdoctoral programs for completion of training.

Designated equivalent sources may be used to verify certain credentials in lieu of using the primary source. See the Glossary for the list of designated equivalent sources.

Note 2: A primary source of verified information may designate to an agency the role of communicating credentials information. The designated agency then becomes acceptable to be used as a primary source.

Note 3: An external organization (for example, a credentials verification organization [CVO]) or a Joint Commission–accredited health care organization functioning as a CVO may be used to collect credentialing information. Both of these organizations must meet the CVO guidelines listed in the Glossary.

Note 4: When it is not possible to obtain information from the primary source, reliable secondary sources may be used. A reliable secondary source could be another health care organization that has documented primary source verification of the applicant's credentials.

MS.03.01.01 The organized medical staff oversees the quality of patient care, treatment, and services provided by practitioners privileged through the medical staff process.

EP 16 For hospitals that use Joint Commission accreditation for deemed status purposes: The medical staff determines the qualifications of the radiology staff who use equipment and administer procedures.

Note: Technologists who perform diagnostic computed tomography exams will, at a minimum, meet the requirements specified at HR.01.01.01, EP 32.

MS.06.01.03 The hospital collects information regarding each practitioner's current license status, training, experience, competence, and ability to perform the requested privilege.

EP 1 The hospital credentials applicants using a clearly defined process.

EP 9 For hospitals that use Joint Commission accreditation for deemed status purposes: A full-time, part-time, or consulting radiologist who is a doctor of medicine or osteopathy qualified by education and experience in radiology supervises ionizing radiology services.

If you answer ‘YES’ in response to are you meeting the standards listed above…

The next question should be….. "How do you know?"

Practitioners and staff are qualified and able to answer any questions about operation of the fluoroscopic equipment that they use and methods to optimize radiation dose and imaging processes for the procedures that they perform.

The goal is the same, the process to arrive there is the organization's responsibility. This final approach is less prescriptive and allows the organization to tailor the process that best fits their situation.

Processes to ensure safety and efficiency:

LD.04.01.05: Effectively manages programs, services, sites or departments:

- EP 25: Designates an individual to serve as **radiation safety officer** responsible of making certain that radiologic services are provided in accordance with law, regulation, and organizational policy. Necessary authority and leadership support to:
  - Monitor/verify compliance with established radiation safety practices (monitoring oversight)
  - Provide recommendation for improved radiation safety
  - Intervene as needed to stop unsafe practices
  - Implement corrective action

(little) r (little) s (little) o

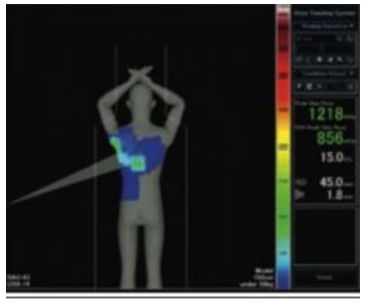
The organization designates this individual.
(Remember HR.01.06.01 Staff are competent to perform their responsibilities.)
(Remember ‘How d you know?)

This **may be** the same individual (but **may not be**) who is the
(Big) **R** (Big) **S** (Big) **O a**pproved by the Nuclear Regulatory Commission or agreement state. These entities that **LICENSE** radioactive material have very specific education, training and experience requirements.

Processes to ensure safety and efficiency:

PC.01.02.15: Provides for diagnostic testing:

- EP 13: For organizations that provide fluoroscopic services: Cumulative-air kerma or kerma-area product documented in retrievable format. Equipment cannot display above – fluoroscopy time & number of spot films
  - Doesn't apply to fluoroscopy equipment used for therapeutic radiation treatment planning/delivery or (7/1/2019) fluoroscopy equipment classified as a mini C-arm



Processes to ensure safety and efficiency:

PC.02.01.01: Provides care, treatment and services for each patient:

- EP 30: For organizations that provide fluoroscopic services: Identifies radiation exposure and skin dose levels, that if exceeded, trigger further review and/or patient evaluation to assess for adverse radiation effects

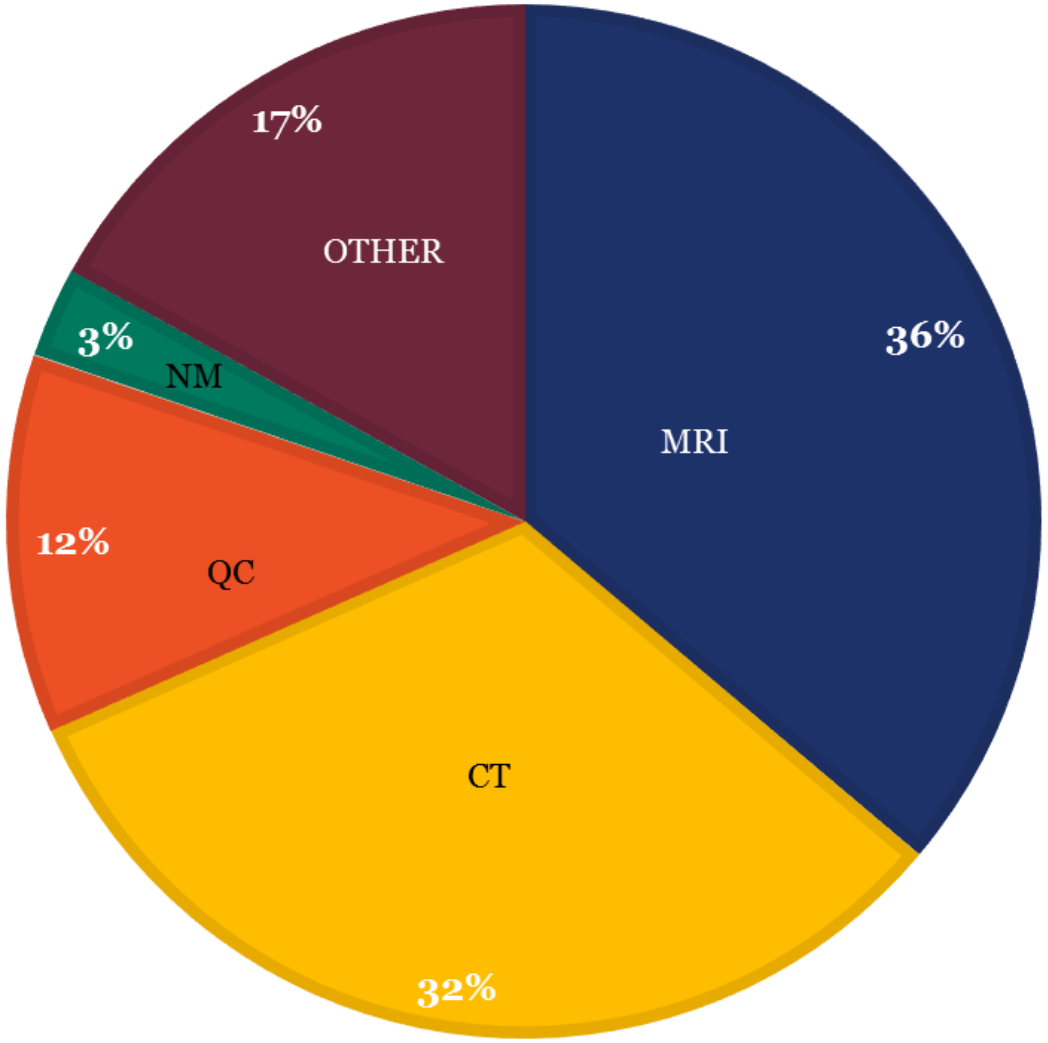
  - Note 2: Thresholds may be based on metrics such as reference-air kerma, cumulative-air kerma, kerma-area product or fluoroscopy time

Processes to ensure safety and efficiency:

PI.02.01.01: Compiles and analyzes data:

- EP 20: For organizations that provide fluoroscopic services: Reviews and analyzes instances where the radiation exposure and skin dose thresholds identified by the organization are exceeded.
  - Note : Radiation exposure thresholds may be based on metrics such as reference-air kerma, cumulative-air kerma, kerma-area product or fluoroscopy time (See also PC.02.01.01, EP 30)

Imaging RFIs 2018, Q1 2019



EPs SCORED BY MODALITY 2018-Q1 2019

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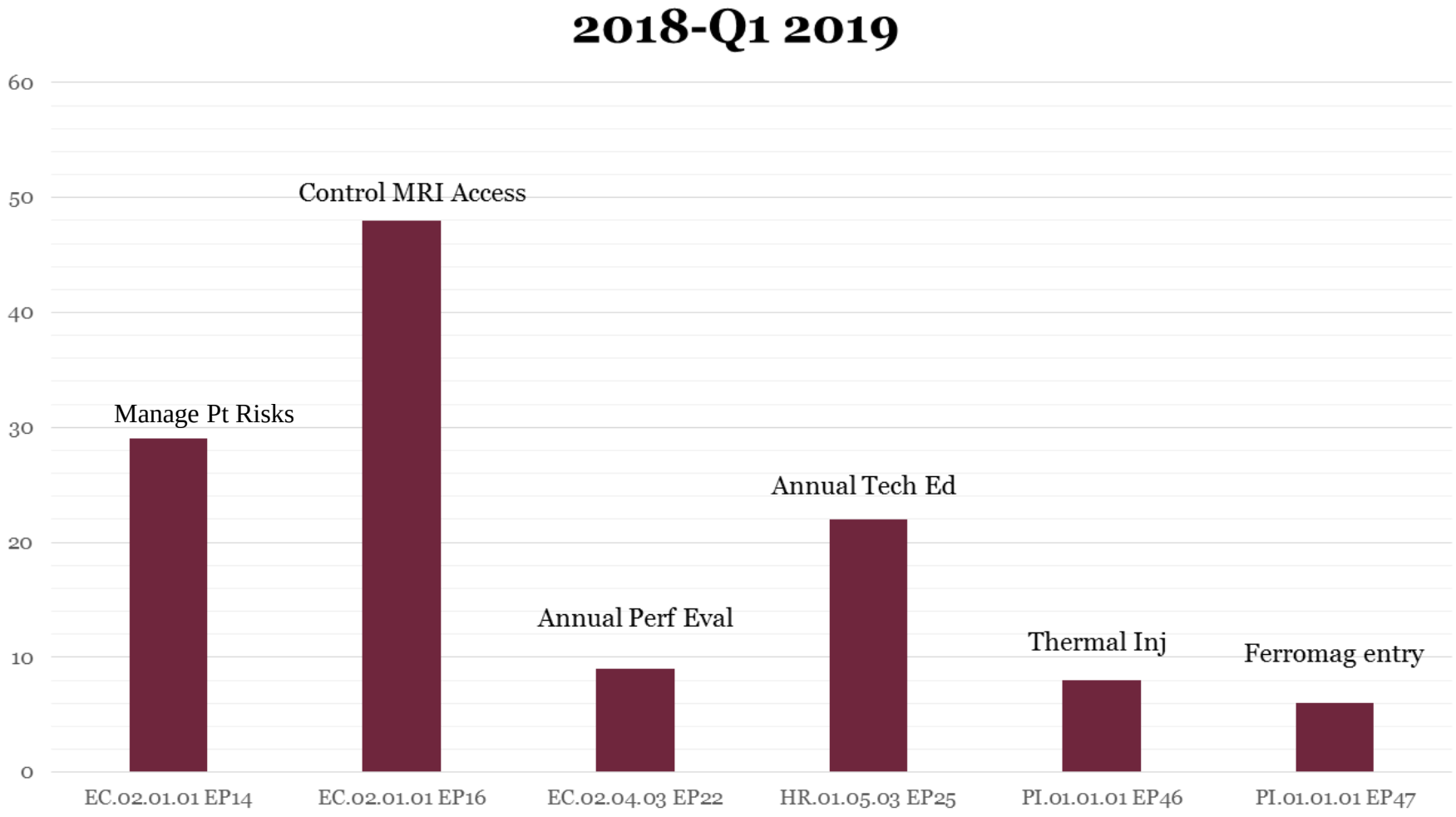
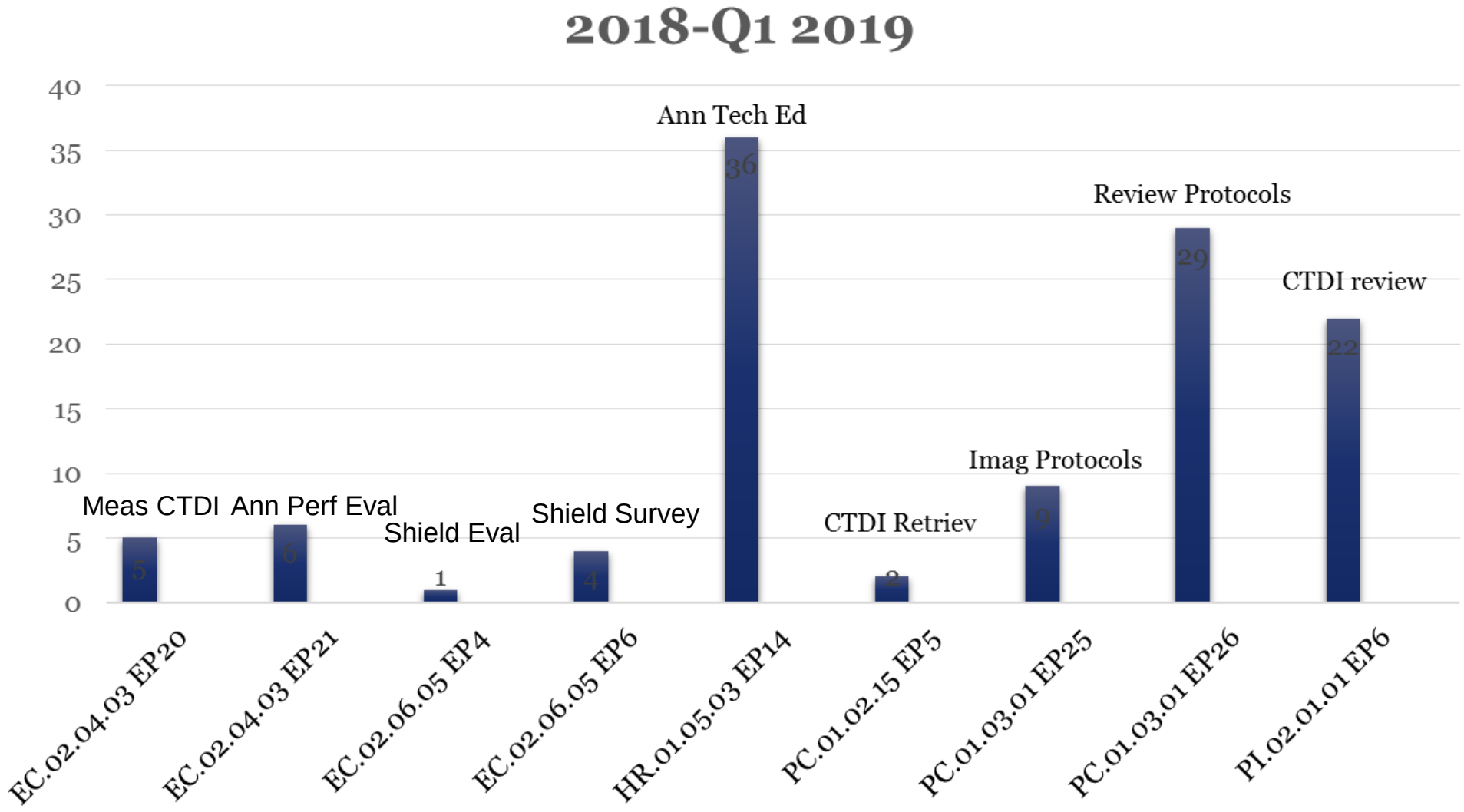
MRI Data



CT Data



Surveyor Observations / Comments

Observations/Comments:

- Missing/ incomplete CT QC data
- Missing MRI QC
- Performance testing outside +/- 30 days
- Failed ACR item; no documentation of correction
- Changed kV 100-120 did not retest
- Knee MRI coil malfunction not corrected
- Annual MRI performance evaluation not done
- Misrepresentation of data; blanks after signature [look at forms]

Observations/ Comments:

- NM monitor didn't have SMPTE; couldn't test
- No annual NM performance evaluation
- CT: no shielding calculation or surveys
- Documentation of physicist's qualifications
- No annual CT tech training
- NM doses not being checked
- Contrast –handwritten protocol taped to cabinet
- No contrast protocol for RT CT simulator

Observations/ Comments:

- MS – no confirmation of approval for qualifications of NM staff
- MS – no confirmation NM director
- MS.03.01.01 The organized medical staff oversees the quality of patient care, treatment, and services provided by practitioners privileged through the medical staff process.

Two Additional Thoughts……

About those eggs……

- **74°C (165°F):** Microwave egg and egg-containing dishes to 74°C (165°F) and let stand covered for two minutes
- **68°C (155°F):** Cook foods prepared with raw shell eggs not broken for immediate service to 68°C (155°F) for 15 seconds
- **63°C (145°F):** Cook raw shell eggs broken for immediate service to 63°C (145°F) for 15 seconds
- **60°C (140°F):** Hold cooked eggs and egg-containing foods hot at 60°C (140°F) or above

How do you know?

Hand Hygiene Alert

Effective January 1, 2018, for all accreditation programs, any observation by surveyors of *individual* failure to perform hand hygiene in the process of direct patient care will be cited as a deficiency resulting in a Requirement for Improvement
(RFI) under Infection Prevention and Control (IC) Standard IC.02.01.01, EP 2: "The [organization] uses standard precautions, including the use of personal protective equipment, to reduce the risk of infection." Surveyors also will continue surveying an organization's hand hygiene *program* to National Patient Safety Goal PSG.07.01.01.

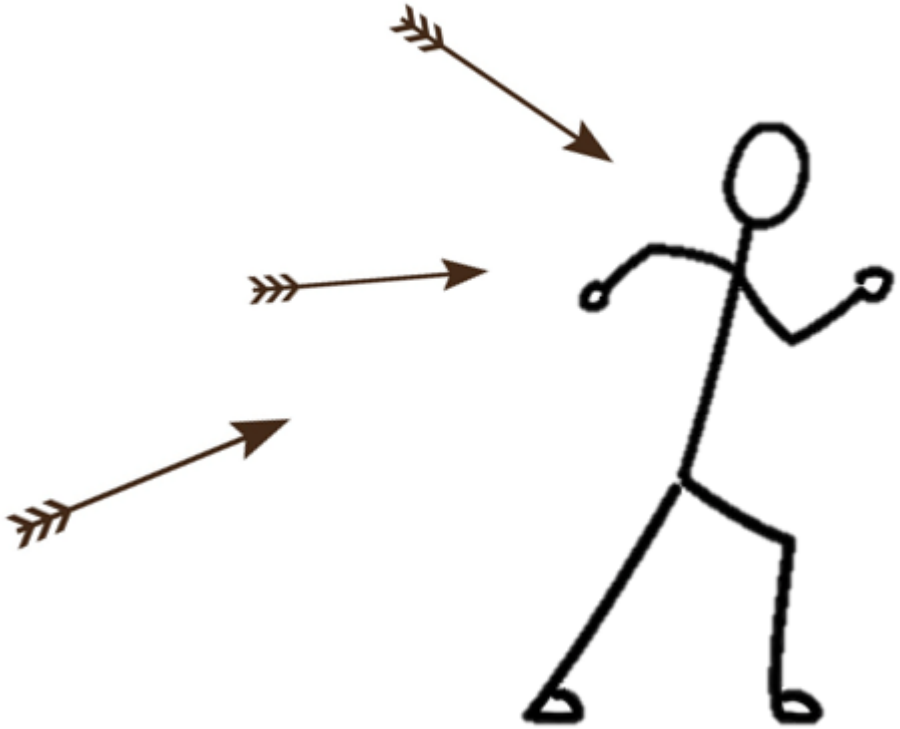
Wait a minute….just thought of two more!

Surveyor score –
Air pressure relationships

- Look at ANSI/ASHRAE/ASHE Standard 170-2008: Table 7-1 Design Parameters
- Laboratory, nuclear medicine: negative to adjacent areas, room air exhausted directly to Outdoors
- X-ray(surgery/critical care and catheterizations): positive to adjacent areas

Blocked breakers and panels

Questions?



Thank You!

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