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EDITOR'S PAGE

Old Dogs/New Tricks

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When we returned from a week of vacation and stopped by our neighbor's house to retrieve our 12-year-old terrier mix, my neighbor said, "Murphy, sit." He sat. I thought—no big thing. He has done that for me for years. Then he said, "Murphy, down." The dog lay flat on the floor. "Murphy, roll over." I was astonished to see my quite mature canine rolling over time after time. "See, you can teach old dogs new tricks," my neighbor said. "How long did it take you to teach him that?" I said. "It wasn't easy, we have been working on it all week," he admitted.

This experience caused me to reflect on what many of our colleagues in interventional cardiology are currently considering. Should they try to learn new tricks? How many tricks should they take on? And, will the ability to perform those tricks be maintained? Those of us who performed percutaneous coronary intervention (PCI) before stents remember the adrenaline rush of successfully performing an angioplasty procedure or bailing out from a serious complication. Believe me, it was not "plain, old balloon angioplasty" back then. The excitement of achieving a decent result by pinning down a long obstructive dissection with prolonged balloon inflation is now gone. Thank goodness! Now with a combination of improved technology and extensive experience, most of these procedures have become relatively routine.

Murphy also through years of training and experience has mastered the routine procedures. He will chase the squirrels away from the bird feeder as efficiently as ever, and he knows never to leave the yard. He seems content, but does he ever dream of mastering brand new tricks?

The new tricks in interventional cardiology remind me of the early days when angioplasty was also new. These new tricks of closing intracardiac defects, inserting various heart valves, opening up chronically occluded arteries, and many others are now not only possible but are frequently performed. Performance of some of these tricks have been regulated such as transcatheter aortic valve replacement (TAVR) (surgical involvement required and eligibility tightly defined), but as indications are loosened, the procedure will be performed far beyond the confines of the experienced, high-volume centers. What does the expert PCI operator do as others take up these exciting new tricks? Will the drive for an angioplasty high become the desire for a TAVR high? For some it will. For others, letting the young dogs jump through flaming hoops will be okay. As I travel, I see both approaches and both may be fine. They are fine if the volume of cases ensures that the operator and entire team can maintain competence. Expecting Murphy to roll over once a month is not going to do the job. He may attempt it but will not be successful. As these wonderful new technologies, one by one, become part of interventional cardiology training, how many of them should be mastered and by whom? Some training programs are aimed at a 2-year experience to qualify graduates for many of these new procedures. Will there be adequate volume to maintain competence for all these operators? Even as TAVR and mitral valve interventions become more common, the nuances of each case require experience. As I watched an experimental procedure performed on the mitral valve of a patient with severe organic mitral valve disease, a familiar terrifying moment occurred. A new valve was inserted but moments later prolapsed into the left atrium. Because of the extensive experience of my colleagues at Emory, the problem was resolved with a highly complicated approach. As interesting as this was, it is clear that these sorts of things cannot be mastered without extensive background experience. I

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believe that concentrating that experience among a limited number of interventionalists will be the best route to quality. Some of those who become structural heart disease specialists will be PCI operators with years of experience. Others will be young physicians who have trained extensively on the new techniques.

Murphy was trained early never to leave the yard. He performs his job of chasing the squirrels and being adorable admirably. Many interventionalists will stay in the yard and perform PCI with deft adroitness that may border on boredom but will assure confidence that quality is maintained. Others will opt for new tricks but, if so, must be committed and, by virtue of volume, capable of practicing those tricks constantly. Yes, old dogs can learn new tricks, but for some the next question is, "Why?"

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