COVID-19 Financial Impact

Scott Segal, MD, MHCM
Wake Forest School of Medicine

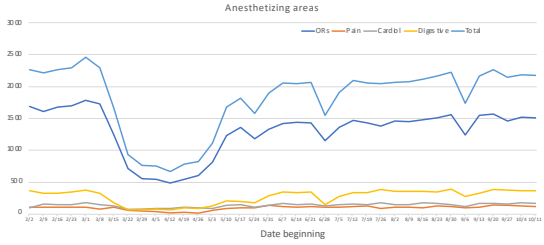
1

Timeline

Date	Events
March 13	Discussion of possible case limitations starts; no cases in system yet
March 17	"Possible" community spread noted, zero cases in system stiull
March 18	Agreement with local competitors to reduce "all nonessential surgeries, procedures, and ambulatory visits" with day-by-day consideration
March 21	State HHS Commissioner asks all hospitals to stop performing "all cases that can be safely deferred at least 4 weeks" (still no inpatients at Wake Forest)
March 26	Case reductions enforced system wide
May 5	Begin reopening: primarily outpatient, short stay cases in community hospitals
May 19-31	Reopening continues, includes main campus
June-August	Rate limiting step becomes postoperative nursing—many unstaffed beds limits volume

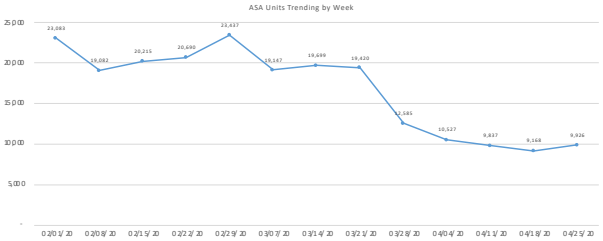
2

Case volumes



3

ASA unit decline



4

COVID-19 Impact – End of Year Forecast Volume Modeling

C1 Funds Flow FY '20 Year End Financial Forecasts

Scenarios based on various COVID-19 Recovery Models

Estimated from 3rd and 4th weeks of March, 1st week April

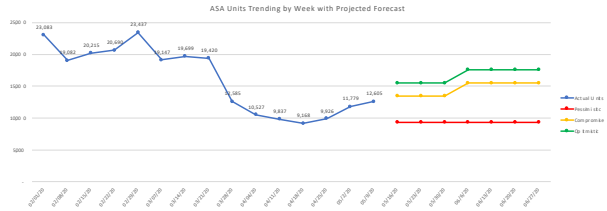
	PESSIMISTIC FORECAST	COMPROMISE FORECAST	OPTIMISTIC FORECAST
ASA Units, General OR & Pain wRVU *			
April Volume Forecast % of Baseline	45%	45%	45%
May Volume Forecast % of Baseline	45%	65%	75%
June Volume Forecast % of Baseline	45%	75%	85%

For reference, March was 84% of baseline levels with 2+ weeks of typical OR case volumes

*Baseline=January+February 2020 annualized

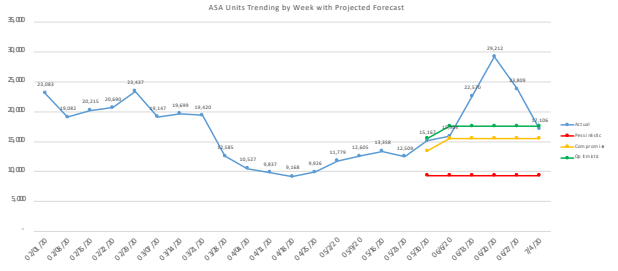
5

ASA Units by Week – February to Current



6

ASA Units by Week – Feb – June FY '20



7

Financial impact: departmental revenue

- Funds flow: fixed $/unit, $32.32; other negotiated rates for wRVU
- Compared to July-Feb run rate, 125,913 units missing = $4,069,503 or 10.4%
- wRVUs (OR, Acute Pain) similarly impacted; ICU, Chronic Pain > budget > prior year-based run rate
- Net financial impact vs. July-Feb run rate = ($2,463,040) or (5.2%)

8

Financial impact: departmental expenses

- Discretionary expenses nearly zeroed out after March
  - Travel ban reduced academic, global health, most faculty development spends
  - Research suspension froze departmental research expense
- Furloughs for staff (25%), salary reduction (15%) for directors, chairs
  - Lifted one month early due to rapid recovery, CARES funds
- Major expense reduction: variable compensation for faculty, CRNAs
- Institution agreed to line of credit for departmental shortfalls
  - Base pay and variable through March to be guaranteed ("pay for all work already done, but not for work not done")
  - LOC to be paid back in FY 21 prior to paying any variable compensation
  - Models projected LOC required from $136,000 to $2.6 M

9

Financial impact: faculty compensation (1)

- Faculty compensation plan
  - Base pay dependent on academic rank, years in rank (~85% of total cash comp)
  - Clinical commitment for base: total Clinical Service Units per year
  - Variable clinical pay: extra CSUs paid quarterly
  - Citizenship bonus: fac mtg, GR attendance, chart completion paid semiannually
  - Non-clinical bonus: points-based system paid annually
- Guaranteed base, all variable clinical pay; froze accrual of other bonus pools after March
- Sharply reduced available CSUs during shutdown, gradually restored
  - Positive CSU balances "spent down" to maintain pace for base pay

10

Financial impact: faculty compensation (2)

- Comparison year over year FY 19 to FY 20, "same store" faculty
- Fixed (base) pay +2.1% (↑ time in rank, promotions)
- Variable pay (33.5%)
- Net negative TCC *averaged* (-5%) or ($19,300) with *large variation*
  - Some faculty earn much more than others voluntarily by extra CSUs

11

Financial impact: CRNA compensation

- CRNA compensation plan
  - Hospital employees, base salary based on years of service, expect 40 hr/week
  - Leadership reports to Anesthesiology Chair, Dept pays ~1/3 of payroll
  - Extra shifts paid as "freelance" at premium rate
  - Freelance shifts universally in the daily staffing model
- In March as shutdown began, instituted plan to flex down, avoid anticipated furloughs: "Pay now, work later"
  - Choice between accrued vacation, unpaid time off, paid time at home with owed freelance shifts without further compensation in future
  - Deferred ~$350K in freelance + ~300K paid back in FY20 ramp up and FY21
  - Effectively preserved 100% of base pay, reduced availability of freelance

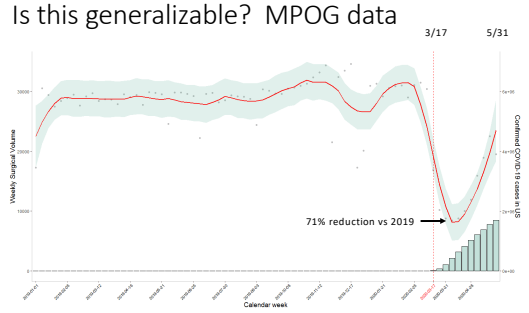
12

Financial impact: institutional support

- Net departmental finances closed year with $208,000 deficit (LOC)
  - 0.45% of overall budget
- Paid back in first quarter FY21

13

Is this generalizable? MPOG data



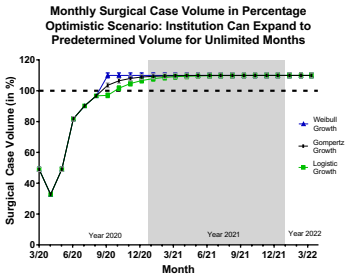
14

Modeling impact and recovery

- Survey of academic chairs, N=49 responses
  - Magnitude of decrease and recovery by month
  - Projected possible increase over pre-COVID baseline during recovery
- Used to guide parameters for Monte Carlo simulation of recovery
  - 3 different growth functions to fit data (Gompertz, Weibull, Logistic)
  - 10,000 runs per model
- Assumed case mix did not change (questionable)
- Pessimistic model: volumes return to 100 ± 2% of baseline
- Optimistic model: volumes surge up to 110 ± 2% of baseline
- Burnout model: initial surge to 110% but decay over months

15

Modeling impact and recovery

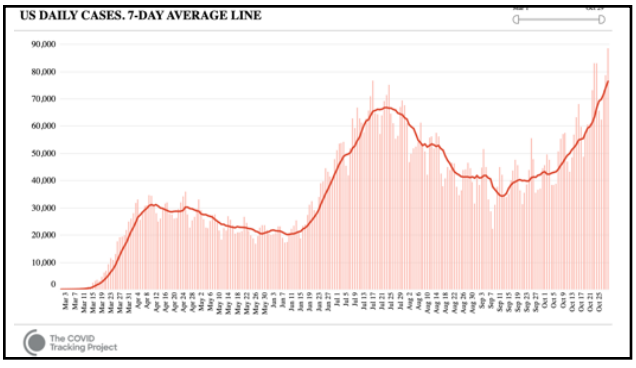


16

Modeling impact and recovery

- At 110%, volume backlog does not clear after 2 years
- To clear by end 12/2020, 50-56% increase in capacity required
- To clear by end 6/2021, 25% increase in capacity required
- No "V-shaped" recovery!

17



18

It's not over yet: capacity constraints

- "Covid-19 hospitalizations currently are rising in 39 states—with 16 states reporting either having reached or nearing their highest hospitalization rates since the country's coronavirus epidemic began, Axios' "Vitals" reports. And as a result of those spikes, some hospitals are beginning to run low on staff, hospital beds, and ICU capacity."
- Nursing shortages, closed beds
- Changes in health insurance 2° job changes
- Supply chain, PPE still insecure
- New shutdowns not out of the question

19

Coronavirus: Belfast elective surgeries cancelled

By Lesley-Anne McKeown
BBC News NI

13 October

France, Germany impose new lockdowns to curb virus spread

France has announced a full nationwide lockdown for the second time this year and German officials imposed a partial four-week lockdown as governments acro Europe sought to stop a fast-rising tide of coronavirus cases

By FRANK JORDANS and THOMAS ADAMSON Associated Press
October 28, 2020, 4:44 PM · 6 min read

THE HILL

Should COVID still force us to postpone elective surgery or forgo a trip to the ER?

BY DR. JONATHAN FIELDING, OPINION CONTRIBUTOR — 10/13/20 04:30 PM EDT
THE VIEWS EXPRESSED BY CONTRIBUTORS ARE THEIR OWN AND NOT THE VIEW OF THE HILL

105 COMMENTS

Doctors Worry Another COVID-19 Shutdown Could Further Delay Elective Surgeries

By BILL BUCHNER • OCT 13, 2020

20