

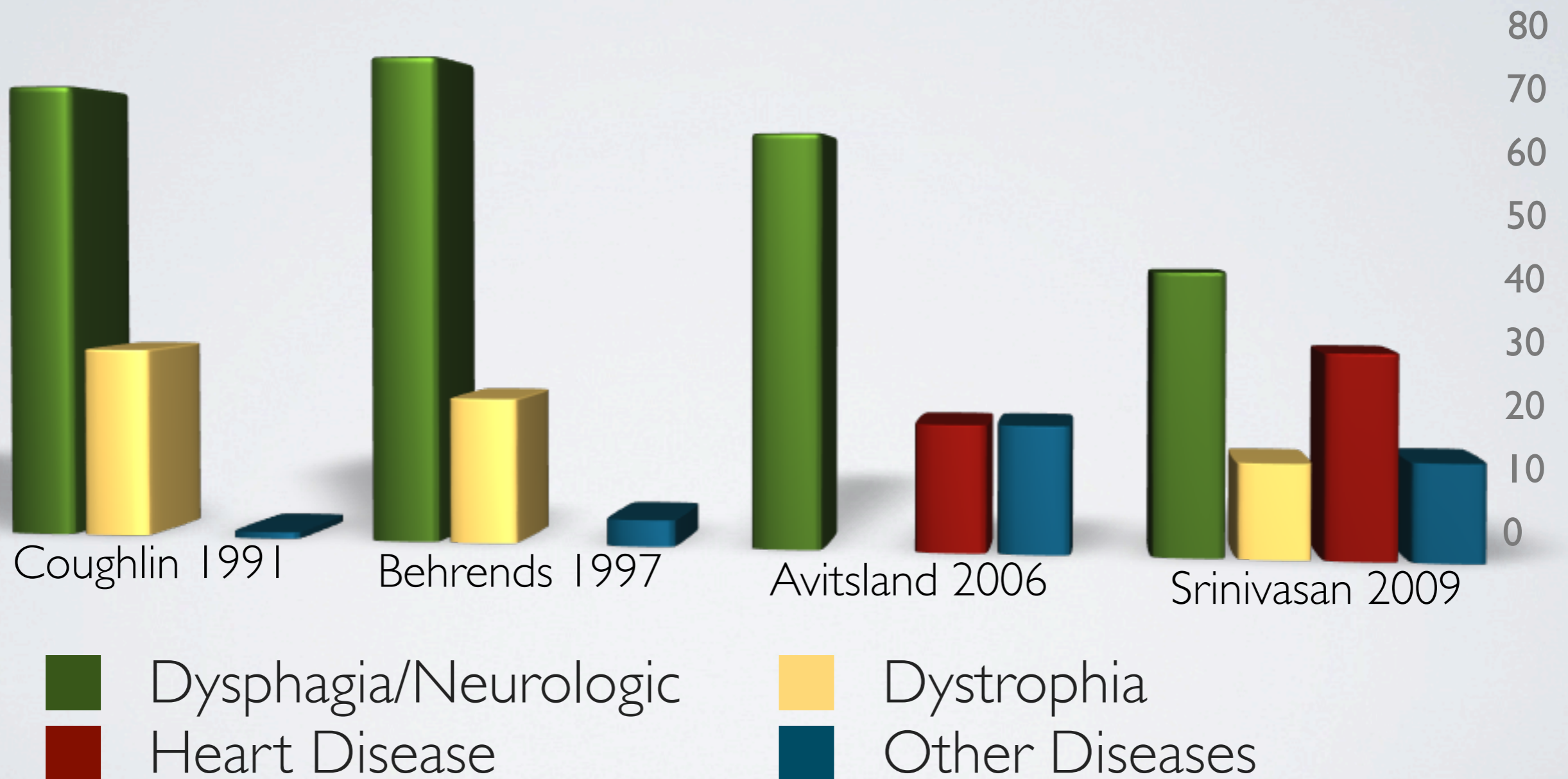
PEDIATRIC FEEDING TUBE WEANING



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PEDIATRIC TUBE FEEDING INDICATIONS



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IMPACT OF TUBE FEEDING ON FEEDING BEHAVIOR

- Oral-motor and sensory development
 - Reduces swallowing activity, vomiting, over-stimulation ⁽⁵⁾
- Motor development
 - Mobility can be impaired by the mechanisms of tube feeding
- Health
 - Complications, hospitalization, feeding intolerance ^(5,6)
- Initiative
 - No Hunger, no thirst, no initiative to eat ⁽⁷⁾
- Feeding Relationships
 - Lost opportunities ⁽⁸⁾, parental stress ⁽⁹⁾, conflicting recommendations

FEEDING DISORDER IN TUBE-FED CHILDREN

SYMPTOMS PER DAY

| | 3-11 m N=35 | 11-22 m N=33 | 23-46 m N=33 | P |
|------------------------|----------------|-----------------|-----------------|------|
| Food refusal | 2.9 (2.4) | 1.9 (1.4) | 2.3 (1.5) | .09 |
| Vomiting | 1.3 (1.3) | 1.7 (2.0) | 0.8 (1.1) | .05* |
| Gagging | 1.7 (1.7) | 2.2 (3.1) | 2.2 (2.7) | ns. |
| Force feeding | 1.7 (2.7) | 0.7 (1.4) | 0.4 (1.1) | .02* |
| Bizarre eating | 0.9 (2.1) | 0.3 (0.9) | 0.2 (0.4) | .09 |
| Oral motor dysfunction | 1.2 (2.1) | 1.1 (2.0) | 1.1 (1.9) | ns. |
| Total of symptoms | 9.7 (6.8) | 7.9 (5.8) | 6.7 (4.5) | .11 |

How to establish an adaptive feeding pattern in these cases?

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PHASES OF TUBE WEANING

- Intake & Assessment
- Preparation
- Hunger Induction
- Intensive Tube Weaning
- Monitoring

READINESS FOR WEAN INSTRUMENTS

- Parental Interview
- Structured Questionnaire
- Videographed Feeding Situation
- Medical Reports
- Growth charts



Continuum of Food Acceptance



Treatment Goal:



Move to zone green

Home base Feeding Tube Weaning



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HUNGER INDUCTION

| time | before | | day 1 | | day 2 | | day 3 | | day 4 | | day 5 | |
|--------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|------------|
| | nutrit | fluid | nutrit | fluid | nutrit | fluid | nutrit | fluid | nutrit | fluid | nutrit | fluid |
| 8 am | 240 | 120 | 140 | 120 | 40 | 120 | | 120 | | 120 | | 120 |
| 12 am | 180 | 120 | 180 | 120 | 180 | 80 | 180 | 80 | 80 | 80 | 80 | 40 |
| 4 pm | 180 | 120 | 180 | 80 | 180 | 80 | 180 | 80 | 180 | 40 | 100 | 40 |
| 8 pm | 240 | 120 | 240 | 80 | 240 | 80 | 240 | 40 | 240 | 40 | 240 | 40 |
| Total | 840 | 480 | 740 | 400 | 640 | 360 | 600 | 320 | 500 | 280 | 420 | 240 |

| | day 1 | day 2 | day 3 | day 4 | day 5 |
|------------------|-------|-------|-------|-------|-------|
| Fluidal Intake | | | | | |
| Nutrition intake | | | | | |
| Urin/Bowl Move | | | | | |
| Weight | | | | | |
| Sleep Behavior | | | | | |

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INTERVENTIONS

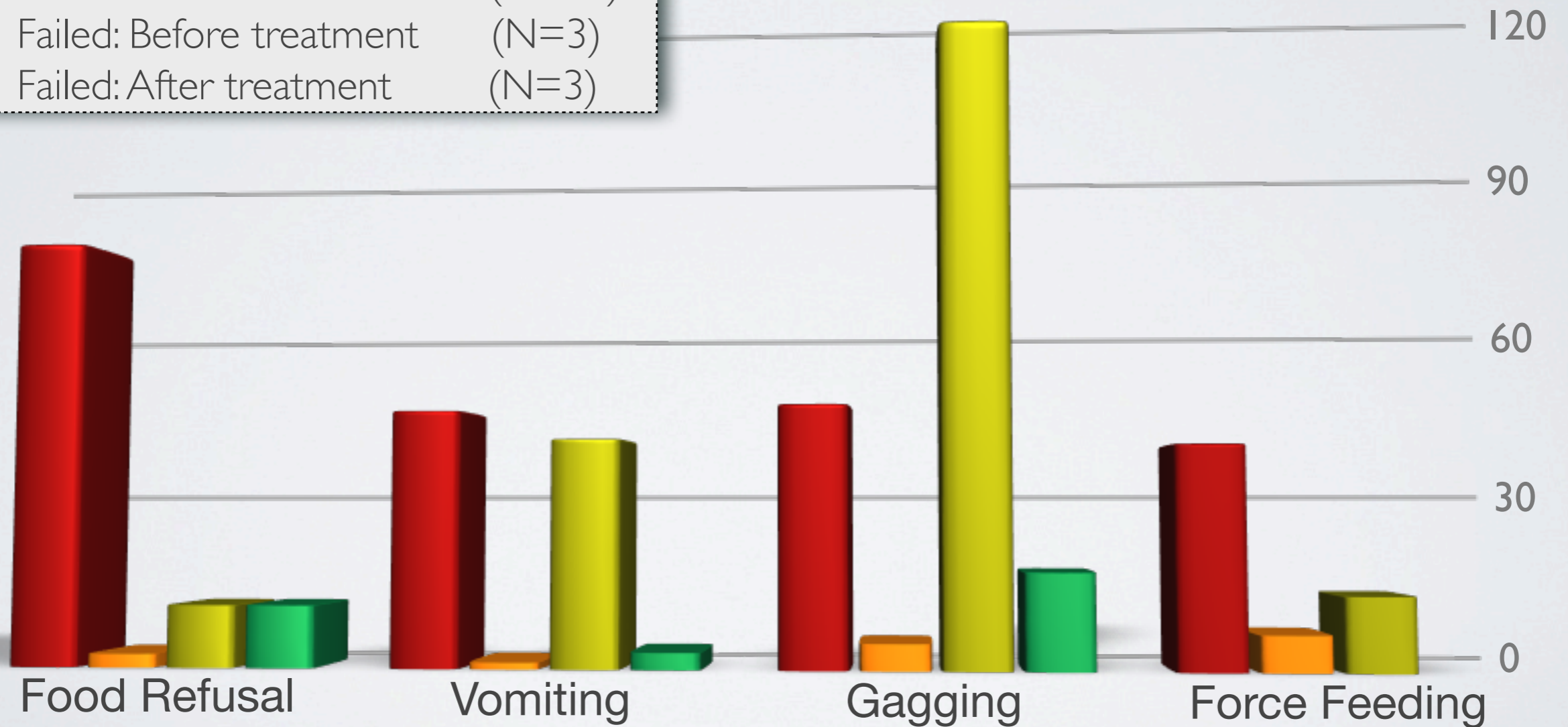
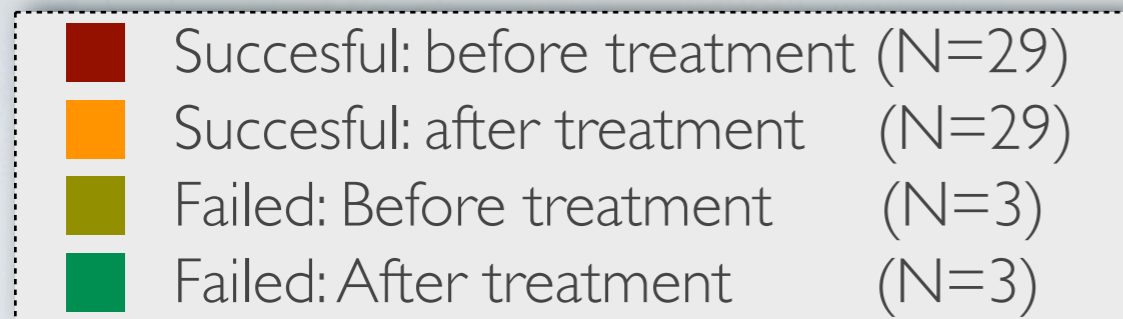
- Therapy in Playing
- Feeding Therapy
- Play Picnic
- Parental Councelling
- Cooperation with the Medical Doctor



FOLLOW UP (SIX MONTHS)

- Regular contact by phone for 4 weeks
 - One conference per week
- Daily contact possible for 6 months
- Counseling in special situations:
 - Infection
 - Short term food refusal
 - Growth and thriving
 - Removal of g-tube

EVALUATION: FEEDING DISORDER SYMPTOMS



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GROWTH AND TUBE FEEDING

| | Before treatment | After treatment ^a | P |
|--------------------------------------|------------------|------------------------------|------|
| Body weights (z-score) ¹ | -2.5 (1.5) | -2.6 (1.1) | .24 |
| Body (z-score) ¹ | -2.8 (2.1) | -2.5 (1.5) | .49 |
| BMI (z-score) ¹ | -1.1 (1.7) | -1.2 (1.1) | .77 |
| Feeding Tube ² | 31 (100) | 6 (19.3) | .05 |
| Nasogastric Tube ² | 16 (51.6) | 1 (3.2) | |
| Gastrostoma ² | 12 (38.7) | 4 (12.9) | |
| Jejustoma ² | 3 (9.7) | 1 (3.2) | |
| Percentage fed via Tube ¹ | 86.2 (18.0) | 11.6 (29.5) | .001 |

Values are either mean (SD) or number (%). Comparisons were done using two-sided t-tests¹ for ordinate data or χ^2 test² for frequency distributions. ^aFollow up one to three years after treatment.

What do you want to discuss or know?

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More details on the
treatment example:

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