Table 1: Summary of Journals in Analysis

Journal	First Publication	Number of Abstracts
Academic Emergency Medicine	1994	4452
American Journal of Emergency Medicine	1983	5587
Annals of Emergency Medicine	1980	5364
BMC Emergency Medicine	2001	496
Journal of Emergency Medicine	1983	3161
The Western Journal of Emergency Medicine	2007	1468

Table 2: Latent Dirichlet Allocation Topic Modeling Results

Topic	Name	Keywords	Abstracts	$\beta * 10^3$	R^2
1	St Mod/Pred	score, ci, predict, risk, triage, model, rule, sensitivity, decision, criterion	464	3.57	0.85
2	Fracture	injury, fracture, trauma, chest, abdominal, radiographs, cervical_spine, radiography, blunt, radiograph	532	-5.35	0.81
3	Statistics	measure, measurement, agreement, estimate, assessment, correlation, kappa, assess, weight, accuracy	327	1.40	0.41
4	Case Pres	diagnosis, case, symptom, acute, disease, presentation, common, pain, review, treatment	879	-3.01	0.37
5	ACS	chest, pain, acute, cardiac, ecg, myocardial_infarction, risk, troponin, acs, stemi	688	2.26	0.38
6	Clin trial	intervention, control, follow, trial, month, randomize, outcome, receive, day, primary	445	2.74	0.71
7	Trauma	trauma, injury, center, score, head, level, severity, blunt, outcome, mortality	417	-1.18	0.60
8	Wound Care	wound, burn, laceration, skin, infection, eye, suture, day, foreign_body, anesthesia	403	-3.84	0.61
9	Drugs/Tox	drug, exposure, case, overdose, poisoning, report, ingestion, poison, cocaine, toxicity	552	-1.63	0.70
10	Intubation	intubation, airway, attempt, success, technique, perform, intubate, endotracheal_intubation, device, difficult	518	-0.54	0.24
11	Med Pub	review, eps, medicine, article, report, ep, quality, publish, search, journal	260	1.25	0.47
12	Pediatrics	child, pediatric, age, young, month, infant, parent, ped, aged, adult	95	0.42	0.24
13	Lab Tests	level, serum, blood, concentration, sample, acute, laboratory, glucose, mg_dl, plasma	504	-1.10	0.21
14	BP/O2Sat	pressure, blood, arterial, mm_hg, change, oxygen, respiratory, increase, measurement, gas	499	-6.14	0.83
15	Body Temp	degree, temperature, fluid, hypothermia, water, ml, body, cooling, air, heat	277	-3.82	0.80
16	Injury	injury, related, victim, age, crash, death, case, driver, report, male	565	-0.53	0.04
17	Publ H/Dis	cost, health, system, service, disaster, event, provide, public, facility, model	571	-2.71	0.65
18	Health Util	visit, increase, ed, utilization, health, population, prescription, national, related, number	747	5.63	0.94
19	CPR	compression, cpr, chest, device, perform, minute, ventilation, technique, hand, standard	356	-2.17	0.35
20	Ultrasound	ultrasound, ci, appendicitis, diagnosis, diagnostic, perform, positive, test, pe, accuracy	637	4.33	0.89
21	Sedation	sedation, ketamine, receive, midazolam, adverse_event, propofol, procedure, minute, dose, procedural_sedation	387	1.52	0.52
22	Chart R/EMR	error, medication, record, system, implementation, review, intervention, order, guideline, period	477	2.32	0.87
23	Radiology	ct, head, image, ct_scan, compute_tomography, imaging, finding, undergo, contrast, mri	345	2.38	0.95
24	Risk Fact	ci, associate, factor, age, risk, confidence_interval, outcome, odd_ratio, association, adjust	315	8.25	0.95

Table 2 – Continued from previous page

Topic	Name	Keywords	Abstracts	$\beta * 10^3$	R^2
25	IV Place	ultrasound, placement, catheter, technique, procedure, access, guide, attempt, iv, perform	430	-1.11	0.13
26	Disposition	admission, discharge, day, admit, outcome, hospitalization, inpatient, hour, return, visit	498	3.76	0.94
27	Med Ed	resident, student, training, medicine, score, skill, performance, simulation, assessment, test	638	1.60	0.66
28	Stroke/Bleed	stroke, bleeding, acute, ischemic_stroke, pregnancy, ectopic_pregnancy, risk, treatment, outcome, receive	267	1.76	0.90
29	Pain	pain, score, acute, receive, treatment, difference, minute, asthma, analgesic, opioid	800	2.44	0.21
30	Outcomes	mortality, sepsis, day, lactate, admission, outcome, shock, score, early, severe	430	4.18	0.71
31	Res Train	program, medicine, residency, resident, survey, training, academic, report, practice, faculty	601	1.01	0.11
32	Op Metrics	minute, hour, triage, increase, median, period, day, delay, length_stay, decrease	634	4.18	0.79
33	Acad Res	research, medicine, base, provide, develop, health, process, practice, identify, development	1198	2.73	0.42
34	Card Arrest	cardiac_arrest, survival, resuscitation, cpr, outcome, discharge, defibrillation, cardiac, ventricular_fibrillation, arrest	554	-6.24	0.71
35	Survey Meth	survey, report, provider, satisfaction, health, participant, respondent, experience, response, question	678	1.94	0.30
36	Prehosp Ca	ems, transport, prehospital, service, paramedic, ambulance, system, call, response, scene	494	-4.74	0.76
37	Mental H/SA	alcohol, screen, test, hiv, screening, risk, psychiatric, testing, positive, prevalence	458	1.04	0.21
38	Lab/B Sci	animal, minute, model, effect, epinephrine, rat, control, increase, hour, mg_kg	662	-11.23	0.89
39	Treatment	treatment, administration, dose, receive, hour, therapy, iv, intravenous, administer, oral	421	-5.22	0.71
40	Infection	antibiotic, infection, culture, positive, blood, treatment, pneumonia, influenza, test, bacteremia	505	-0.16	0.01

Table 3: Summary of Analysis by Research Themes

Topic Group	Topics	Percentage of Abstract Contribution	$\beta * 10^3$	R^2
Administration	26, 30, 32	12.77	19.77	0.94
Cards	5, 34	7.75	-5.81	0.73
EMS	36	3.97	-7.21	0.78
Infection	40	3.01	-0.08	0.00
Med Ed	27, 31	8.91	4.60	0.43
Mental Health	37	3.28	1.82	0.25
Pain	21, 29	7.44	6.64	0.34
Peds	12	2.27	0.79	0.33
Public Health	17, 18	9.85	5.14	0.81
Radiology	20, 23	7.21	10.95	0.98
Rescuscitation	10, 14, 15, 19, 25	14.64	-20.78	0.67
Stroke	28	2.02	2.89	0.90
Toxicology	9	3.67	-2.35	0.69
Trauma	2, 7, 8, 16	13.21	-16.39	0.91