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A survey by the convent of University Professors of Orthopaedic and Trauma surgery in Germany

To evaluate the impact of the COVID-19 pandemic on orthopaedic and trauma surgery in university hospitals in Germany

A) Government	Totally agree	Rather agree	Neutral	Rather disagree	Totally disagree
1. Did you perceive the communication of information by the government at different points in time as appropriate?					
2. Have you assessed the political measures taken as adequate?					
3. Did you perceive the postponement of elective operations as an adequate measure?					
4. Would you have preferred more commitments for financial support/coverage?					
5. Despite the pandemic the work of our department has been perceived as important.					

B) Health Authorities (Robert Koch-institute, public health department, Paul-Ehrlich-institute)	Totally agree	Rather agree	Neutral	Rather disagree	Totally disagree
6. Communication of information by the authorities was adequate.					
7. The authorities were competent counterparts.					
8. The authorities enacted adequate measures for the protection of healthcare workers (e.g. protection in the emergency department/OR/ward).					
9. The authorities were perceived as supporters of our department.					

C) Hospital administration	Totally agree	Rather agree	Neutral	Rather disagree	Totally disagree
10. Communication with the hospital administration was adequate.					
11. The hospital administration explicitly communicated that financial targets are second-tier in the current situation.					
12. The hospital administration actively regulated personnel distribution.					
13. There was financial compensation for the reallocation of staff from other departments (e.g.: anaesthesia/ intensive care).					
14. The hospital administration ensured sufficient protection of their employees (e.g. SOPs, providing protective equipment).					
15. The hospital administration was perceived as a supporter of the orthopaedic and trauma surgery department.					
16. The orthopaedic and/or trauma surgery departments were actively included in crisis management.					
17. The orthopaedic and/or trauma surgery departments were included in the following crisis management groups:	<i>(free text)</i>				

D) Other departments	Totally agree	Rather agree	Neutral	Rather disagree	Totally disagree
18. Communication with anesthesiologists and intensive care physicians was adequate.					
19. Communication with infectiologists was adequate.					

E) Restructuring/Consequences of the pandemic	Capacity reduction in %	Reduction of capacity utilisation in %
20. Estimate the capacity and its utilisation of <u>patient beds</u> in your department.		
21. Estimate the capacity and its utilisation of <u>operating rooms</u> in your department.		
22. Estimate the capacity and its utilisation of the <u>outpatient department</u> in your department.		
23. Estimate the fraction of doctors who were reallocated to other departments.		
24. Which departments were those doctors allocated to?	<i>(free text)</i>	
25. Estimate the fraction of doctors of your department with reduced working-hours.		
26. Estimate the fraction of doctors of your department who have been infected by SARS-CoV-2.		
27. Estimate the fraction of doctors of your department who are/were in home quarantine.		

E) Restructuring/Consequences of the pandemic	Yes	No
28. Reduction of overtime hours was ordered.		
29. Vacation was ordered.		
30. The wage agreement's legal requirements were met in doing so.		
31. Sufficient adequate protective equipment was provided for your employees.		
32. Emergency surgeries (at least N4 classified) had to be postponed due to sick leaves of employees.		
33. At this point, would you consider that not achieving your financial target settings will have financial consequences for your department?		
34. At this point, would you consider that not achieving your financial target settings will have consequences for your department's staff?		

E) Financial Impact		Please estimate the loss regarding your financial target settings in the following aspects (in %) at this point.
35. Case Mix Points		
36. Revenue		

F) Future prospects	Totally agree	Rather agree	Neutral	Rather disagree	Totally disagree
37. The number of elective surgeries (e.g. arthroplasty) will decrease in the future.					
38. Your department will have lost significance in the future.					
39. Overall, your department will be weakened by the SARS-CoV-2 pandemic.					

G) Affiliation	Orthopaedics	Orthopaedic and trauma surgery	Trauma surgery
40. Participant in leading function of the			
F) The following field is provided for further comments			
41. (free text)			

Impact of the COVID-19 pandemic on orthopaedic and trauma surgery in university hospitals in Germany

Total score is calculated from the sum of the Likert scale values, where "totally agree" is equal to 5, "rather agree" to 4, "neutral" to 3, "rather disagree" to 2, "totally disagree" to 1

Q1. Did you perceive the communication of information by the government at different points in time as appropriate?

Answer Choices	Responses	Example				
totally agree	13,46%	7	7*5			
rather agree	51,92%	27	27*4			
neutral	11,54%	6	6*3			
rather disagree	19,23%	10	10*2			
totally disagree	3,85%	2	2*1			
Answered			52	total score	mean	SD
Skipped			0	183	3,5	1,1

Q2. Have you assessed the political measures taken as adequate?

Answer Choices	Responses					
totally agree	23,08%	12				
rather agree	48,08%	25				
neutral	11,54%	6				
rather disagree	11,54%	6				
totally disagree	5,77%	3				
Answered			52	total score	mean	SD
Skipped			0	193	3,7	1,1

Q3. Did you perceive the postponement of all elective operations as an adequate measure?

Answer Choices	Responses					
totally agree	9,62%	5				
rather agree	36,54%	19				
neutral	15,38%	8				
rather disagree	32,69%	17				
totally disagree	5,77%	3				
Answered			52	total score	mean	SD
Skipped			0	162	3,1	1,1

Q4. Would you have preferred more commitments for financial support/ coverage?

Answer Choices	Responses					
totally agree	38,46%	20				
rather agree	30,77%	16				
neutral	25,00%	13				
rather disagree	1,92%	1				
totally disagree	3,85%	2				
Answered			52	total score	mean	SD
Skipped			0	207	4	1

Q5. Despite the pandemic the work of our department has been perceived as important.

Answer Choices	Responses	
totally agree	25,00%	13
rather agree	21,15%	11
neutral	30,77%	16

rather disagree	15,38%	8			
totally disagree	7,69%	4	total score	mean	SD
	Answered	52	177	3,4	1,2
	Skipped	0			

Q6. Communication of information by the authorities was adequate.

Answer Choices	Responses				
totally agree	13,73%	7			
rather agree	47,06%	24			
neutral	17,65%	9			
rather disagree	17,65%	9			
totally disagree	3,92%	2	total score	mean	SD
	Answered	51	178	3,5	1,1
	Skipped	1			

Q7. The authorities were competent counterparts.

Answer Choices	Responses				
totally agree	13,73%	7			
rather agree	23,53%	12			
neutral	41,18%	21			
rather disagree	15,69%	8			
totally disagree	5,88%	3	total score	mean	SD
	Answered	51	165	3,2	1
	Skipped	1			

Q8. The authorities enacted adequate measures for the protection of healthcare workers.

Answer Choices	Responses				
totally agree	5,88%	3			
rather agree	21,57%	11			
neutral	17,65%	9			
rather disagree	43,14%	22			
totally disagree	11,76%	6	total score	mean	SD
	Answered	51	136	2,7	1,1
	Skipped	1			

Q9. The authorities were perceived as supporters of our department.

Answer Choices	Responses				
totally agree	3,92%	2			
rather agree	9,80%	5			
neutral	33,33%	17			
rather disagree	39,22%	20			
totally disagree	13,73%	7	total score	mean	SD
	Answered	51	128	2,5	0,9
	Skipped	1			

Q10. Communication with the hospital administration was adequate.

Answer Choices	Responses				
totally agree	46,00%	23			
rather agree	30,00%	15			
neutral	10,00%	5			
rather disagree	10,00%	5			
totally disagree	4,00%	2	total score	mean	SD
	Answered	50	202	4	1,2
	Skipped	2			

Q11. The hospital administration explicitly communicated that financial targets are second-tier in the current situation.

Answer Choices	Responses				
totally agree	42,00%	21			
rather agree	28,00%	14			
neutral	12,00%	6			
rather disagree	12,00%	6			
totally disagree	6,00%	3	total score	mean	SD
	Answered	50	194	3,9	1,3
	Skipped	2			

Q12. The hospital administration actively regulated personnel distribution.

Answer Choices	Responses				
totally agree	26,00%	13			
rather agree	30,00%	15			
neutral	18,00%	9			
rather disagree	14,00%	7			
totally disagree	12,00%	6	total score	mean	SD
	Answered	50	172	3,4	1,3
	Skipped	2			

Q13. There was financial compensation for the reallocation of staff from other departments.

Answer Choices	Responses				
totally agree	6,00%	3			
rather agree	8,00%	4			
neutral	34,00%	17			
rather disagree	26,00%	13			
totally disagree	26,00%	13	total score	mean	SD
	Answered	50	121	2,4	1,1
	Skipped	2			

Q14. The hospital administration ensured sufficient protection of their employees.

Answer Choices	Responses				
totally agree	22,00%	11			
rather agree	52,00%	26			
neutral	12,00%	6			
rather disagree	12,00%	6			
totally disagree	2,00%	1	total score	mean	SD

Answered	50	190	3,8	1
Skipped	2			

Q15. The hospital administration was perceived as a supporter of the orthopaedic and trauma surgery department.

Answer Choices	Responses				
totally agree	14,00%	7			
rather agree	16,00%	8			
neutral	32,00%	16			
rather disagree	28,00%	14			
totally disagree	10,00%	5	total score	mean	SD
	Answered	50	148	3	1,2
	Skipped	2			

Q16. The orthopaedic and/or trauma surgery departments were actively included in crisis management.

Answer Choices	Responses				
totally agree	32,00%	16			
rather agree	30,00%	15			
neutral	18,00%	9			
rather disagree	12,00%	6			
totally disagree	8,00%	4	total score	mean	SD
	Answered	50	183	3,7	1,3
	Skipped	2			

Q17. The orthopaedic and/or trauma surgery departments were included in the following crisis management groups:

Answered	50	ICU	5
Skipped	2	OR coordination	4
		ED	4
		COVID19 task forc	24

Free Text:more than one answer possible (shown the most frequently mentioned)

Q18. Communication with anesthesiologists and intensive care physicians was adequate.

Answer Choices	Responses				
Stimme voll zu	46,94%	23			
Stimme eher zu	32,65%	16			
Neutral	12,24%	6			
Lehne eher ab	6,12%	3			
Lehne völlig ab	2,04%	1	total score	mean	SD
	Answered	49	204	4,2	1
	Skipped	3			

Q19. Communication with infectiologists was adequate.

Answer Choices	Responses				
totally agree	34,69%	17			
rather agree	42,86%	21			
neutral	12,24%	6			
rather disagree	8,16%	4			
totally disagree	2,04%	1	total score	mean	SD
	Answered	49	196	4	1
	Skipped	3			

Q20. Estimate the capacity and its utilisation of patient beds in your department.

Answer Choices	Responses	mean	SD
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Reduction of patient bed capacity in % 100,00% 43 45.3% 20,1
 Q21. Estimate the capacity and its utilisation of operating rooms in your department.

Answer Choices	Responses	mean	SD
Reduction of operating room capacity in %	100,00%	43 49.4%	20,4
Utilisation of operating rooms in %	100,00%	43 61.6%	22
Answered		43	
Skipped		9	

Q22. Estimate the capacity and its utilisation of the outpatient department in your department.

Answer Choices	Responses	mean	SD
Reduction of outpatient department capacity in %	100,00%	43 72%	21,1
Utilisation of outpatient department in %	97,67%	42 39,20%	29,1
Answered		43	
Skipped		9	

Q23. Estimate the fraction of doctors who were reallocated to other departments.

Answered	43	mean	SD
Skipped	9	14.7%	17,2

Q24. Which departments were those doctors allocated to? (free text, more than one answer possible)

Answered	43	ICU	19
Skipped	9	ED	12
		COVID-19	18

Q25. Estimate the fraction of doctors of your department with reduced working-hours.

Answered	43	mean	SD
Skipped	9	5,70%	12,1

Q26. Estimate the fraction of doctors of your department who have been infected by SARS-CoV-2.

Answered	43	mean	SD
Skipped	9	2.1%	5,8

Q27. Estimate the fraction of doctors of your department who are/were in home quarantine.

Answered	43	mean	SD
Skipped	9	8.6%	10,4

Q28. Reduction of overtime hours was ordered.

Answer Choices	Responses	
Yes	74,42%	32
No	25,58%	11
Answered		43
Skipped		9

Q29. Vacation was ordered.

Answer Choices

Responses

Yes	20,93%	9
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Q30. The wage agreement's legal requirements were met in doing so.

Answer Choices	Responses	
Yes	93,02%	40
No	6,98%	3
	Answered	43
	Skipped	9

Q31. Sufficient adequate protective equipment was provided for your employees.

Answer Choices	Responses
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Yes	69,77%	30
No	30,23%	13
	Answered	43
	Skipped	9

Q32. Emergency surgeries (at least N4 classified) had to be postponed due to sick leaves of employees.

Answer Choices	Responses	
Yes	2,33%	1
No	97,67%	42
Answered		43
Skipped		9

Q33. Would you consider that not achieving your financial target settings will have financial consequences?

Answer Choices	Responses	
Yes	41,86%	18
No	58,14%	25
Answered		43
Skipped		9

Q34. Would you consider that not achieving your financial target settings will have consequences department's staff?

Answer Choices	Responses	
Yes	34,88%	15
No	65,12%	28
Answered		43
Skipped		9

Q35+36. Please estimate the loss regarding your financial target settings in the following aspects (in %) at this point.

Answer Choices	Responses	mean	SD
Case Mix Points	97,67%	42 29,3%	22,9
Revenue	81,40%	35 29,3%	17,9
Answered		43	
Skipped		9	

Q37. The number of elective surgeries (e.g. arthroplasty) will decrease in the future.

Answer Choices	Responses			
neutral	23,26%	10		
rather disagree	39,53%	17		
totally disagree	11,63%	5	total score	mean
Answered		43	115	2,7
Skipped		9		1,1

Q38. Your department will have lost significance in the future.

Answer Choices	Responses			
totally agree	2,33%	1		
rather agree	6,98%	3		
neutral	18,60%	8		
rather disagree	41,86%	18		
totally disagree	30,23%	13	total score	mean
				SD

Answered	43	90	2,1	1
Skipped	9			

Q39. Overall, your department will be weakened by the SARS-CoV-2 pandemic.

Answer Choices	Responses				
totally agree	6,98%	3			
rather agree	20,93%	9			
neutral	27,91%	12			
rather disagree	25,58%	11			
totally disagree	18,60%	8	total score	mean	SD
	Answered	43	117	2,7	1,2
	Skipped	9			

Q40. Participant in leading function of the department for

Answer Choices	Responses	
Orthopaedics	27,91%	12
Trauma surgery	18,60%	8
Orthopaedics and trauma surgery	53,49%	23
	Answered	43
	Skipped	9

Q41. The following field is provided for further comments

Answered	2
Skipped	50

Free Text: nothing relevant was answered