



2018/19 Season report Team X

The UEFA Elite Club Injury Study (ECIS) was initiated by and is funded and supported by UEFA.

This report has been produced on behalf of the UEFA Medical Committee by: Professor Jan Ekstrand, MD, PhD, Linkoping University Former first vice-chairman of the UEFA Medical Committee

Correspondence should be addressed to:

Injury Study Group

Professor Jan Ekstrand Hertig Karlsgatan 2 582 21 Linköping Sweden jan.ekstrand@telia.com

Håkan Bengtsson

Anna Hallén

info.frq@telia.com

info.frg@telia.com

UEFA

Marc Vouillamoz
Head of Medical and Anti-Doping Unit
marc.vouillamoz@uefa.ch

Niki Papadimitriou

UEFA Medical Assistant

niki.papadimitriou@uefa.com

Route de Genève 46 1260 Nyon 2 Switzerland +41 848 00 27 27 +41 22 707 27 34 (fax)

Table of Contents

1	P	Participating clubs	3
2	P	Presentation	3
3	Interpretation of results		
4	Е	Exposure	5
5	G	General injuries	8
	5.1	General injury patterns	8
6	Ti	raining injuries	12
	6.1	Training injury rate	12
	6.2	Days' absence for training injuries	14
	6.3	Burden of training injuries	14
7	Match injuries		
	7.1	Match injury rate	16
	7.2	Days' absence for match injuries	18
	7.3	Burden of match injuries	18
8	Se	evere injuries	20
	8.1	Severe injury patterns	20
	8.2	Severe injury rate	21
9	N	Auscle injuries	23
	9.1	Muscle injury patterns	23
	9.2	Muscle injury rate	24
	9.3	Days' absence for muscle injurie	26
	9.4	Burden of muscle injuries	27
10		Ligament injuries	29
	10.1	Ligament injury patterns	29
	10.2	2 Ligament injury rate	30
	10.3	B Days' absence for ligament injuries	32
	10.4	Burden of ligament injuries	33
11		Re-injuries	35
	11.1	Re-injury patterns	35
	11.2	Re-injury proportion	36
12		Squad attendance/availability and absence	38
	12.1	Squad attendance/availability	38
	12.2	2 Squad absence	42
	12	2.2.1 Absence due to injury	43
	12.3	Number of training sessions/matches missed because of injury	46

1 Participating clubs

This season report contains fictional results from July to May of the 2018/19 season for 25 Example Teams.

2 Presentation

The report is divided into nine sections, with data on exposure, general injuries, training injuries, match injuries, severe injuries, muscle injuries, ligament injuries, re-injuries, and, squad attendance/availability and absence. These sections contain data of the 2018/19 season from your club in comparison with other participating clubs described as means of the whole season as well as specifically for each month (July-May). Each section also contains historic data which gives you the opportunity to compare the current season with data from your club and other participating clubs in previous seasons. The injury sections are generally split into four sub-sections:

- **Injury patterns:** the relative distribution of injuries of this kind, looking at injury location, type, overuse/trauma, contact/non-contact, severity and re-injury rate.
- **Injury rate:** the number of injuries of this kind relative to exposure time, allowing the individual injury rate to be evaluated. Injury rate is expressed as the number of injuries/1,000 hours of exposure.
- Days' absence: the mean number of days lost because of injuries of this kind.
- Injury burden: a combined measure of the frequency (injury rate) and severity (days' absence) of injuries of this kind giving the burden of injury for the player and the consequences for the team. Injury burden is expressed as the number of days of absence/1,000 hours of exposure. Example: Team A with 10 injuries in 5,000 hours, each resulting in an absence of 10 days on average, has an injury burden of 20 days/1,000 hours. Team B with 20 injuries in 5,000 hours, each resulting in an absence of 5 days on average, also has an injury burden of 20 days/1,000 hours.

3 Interpretation of results

When comparing your club's results with those of other participating clubs, please bear the following in mind:

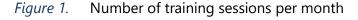
- Because of the limited amounts of data collected over one season, the injury rates presented are sometimes based on just a few actual injuries. This means that some results should be interpreted with caution.
- The overall number of injuries varies between clubs, mainly because of the number of minor injuries. It is therefore important to look not only at the overall injury rate, but also at the data on severe injuries and squad availability, as these variables may have a greater impact on the club.
- In the case of players who were still injured at the end of the season, we have used either the club's estimated return date or an approximation of severity based on the mean absence for this particular injury. Some data on the number of days' absence and injury risk presented in the report could therefore be based on approximate values/estimates.

We hope that you will find this report useful in your daily work treating and preventing injuries at your club. Please do not hesitate to contact FRG if you have any questions about how to interpret the results.

4 Exposure

In total, 180 000 hours of exposure were recorded during the season in the 25 Example Teams, with approximately 150 000 training hours (83%) and 30 000 match hours (17%). Team x reported 8 000 hours of total exposure, with 7 000 training hours (88%) and 1 000 match hours (12%).

On average, teams reported 230 training sessions and 60 matches over the review period. Since the reporting period differed between teams, we have also calculated a monthly training and match load. On average, teams had 21 training sessions and 4.9 matches each month, giving an average training-to-match exposure ratio of 6.0 hours of training for each hour of match play.



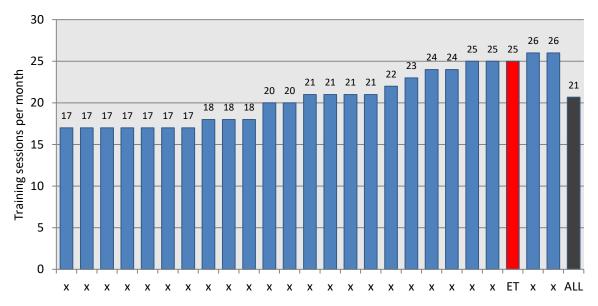


Figure 2. Number of matches per month

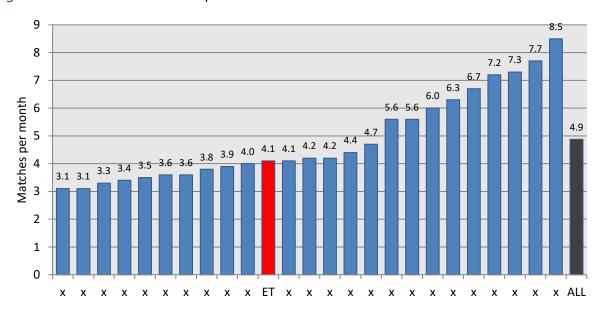


Figure 3. Number of training sessions (blue bars) and matches (red bars) for Team X over the season

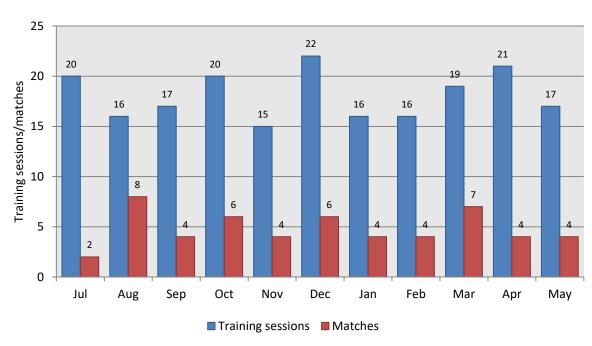


Figure 4. Ratio of training hours to match hours

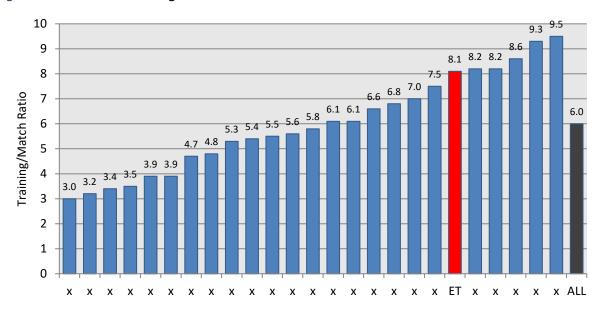
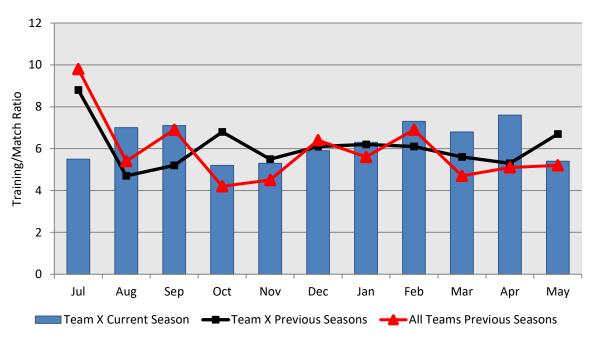


Figure 5. Ratio of training hours to match hours for Team X over the season in comparison to previous seasons



5 General injuries

5.1 General injury patterns

The figures below show the relative distribution (%) of different injuries. In total the 20 UEFA Champions League teams reported 868 injuries, with 410 training injuries (47%) and 458 match injuries (53%). There were 177 severe injuries (20%), 437 muscle injuries (50%) and 126 ligament injuries (15%).

Team x reported xx injuries (xx training injuries; xx match injuries) during the season, including xx severe injuries, xx muscle injuries and xx ligament injuries.

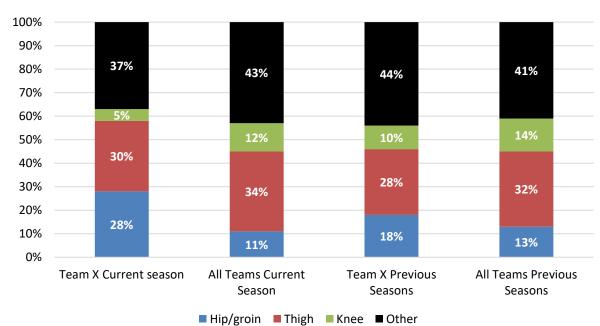


Figure 6. Distribution of injury locations

Figure 7. Distribution of injury types

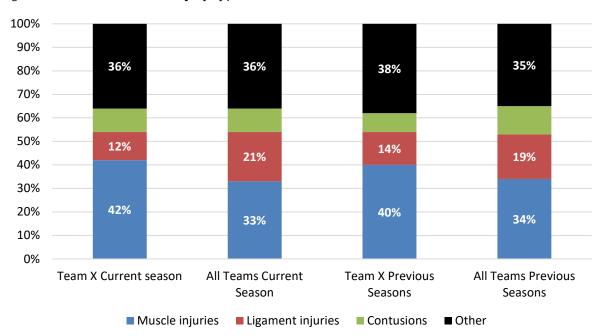


Figure 8. Distribution of overuse/traumatic injuries

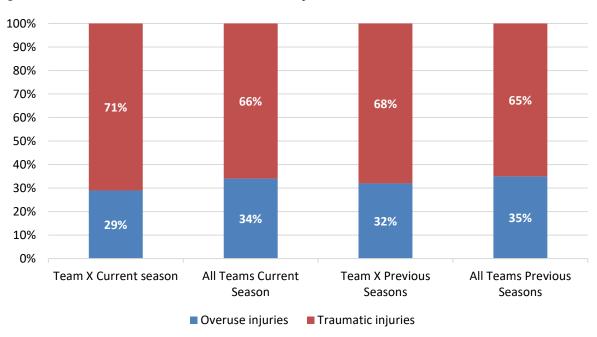


Figure 9. Distribution of contact/non-contact injuries

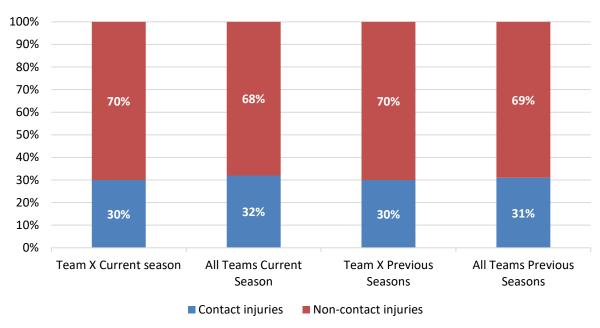


Figure 10. Distribution of injury severities

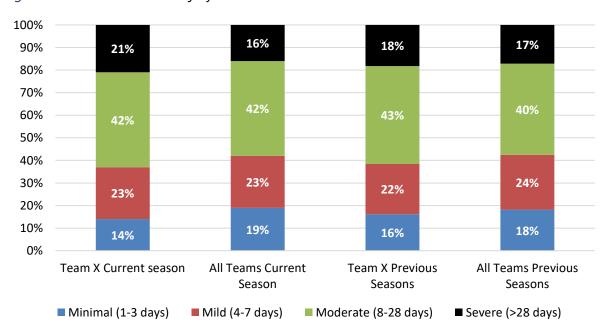
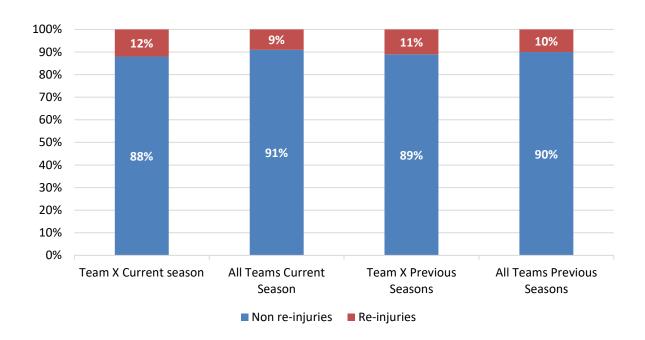


Figure 11. Distribution of re-injuries



6 Training injuries

6.1 Training injury rate

The mean training injury rate for all teams was 1.7 injuries for every 1 000 training hours, with individual rates ranging from 0.1 to 4.9 at the various clubs.

Figure 12. Training injury rate

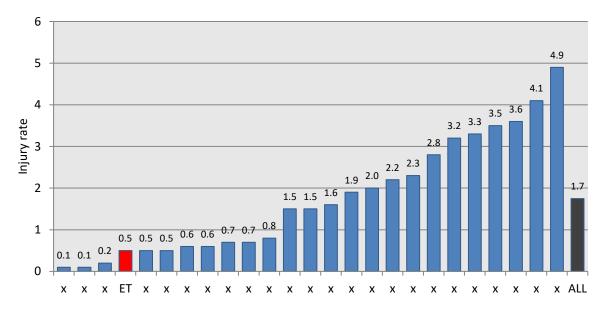


Figure 13. Training injury rates in previous seasons

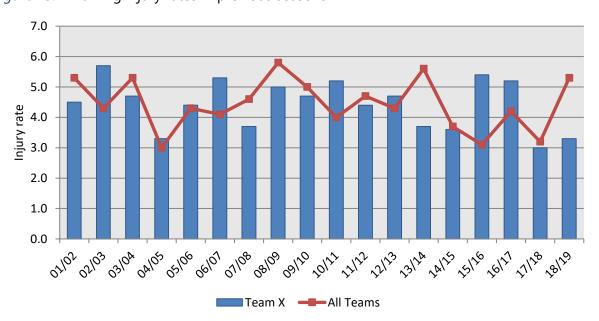
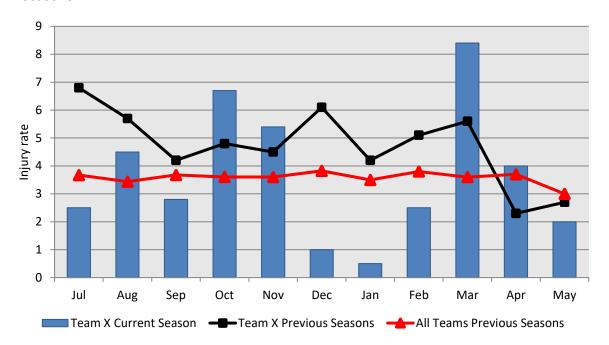


Figure 14. Training injury rates for Team X over the season in comparison to previous seasons



6.2 Days' absence for training injuries

The average absence for training injuries among the teams was 18 days, ranging from 8 to 31 days at the various clubs.

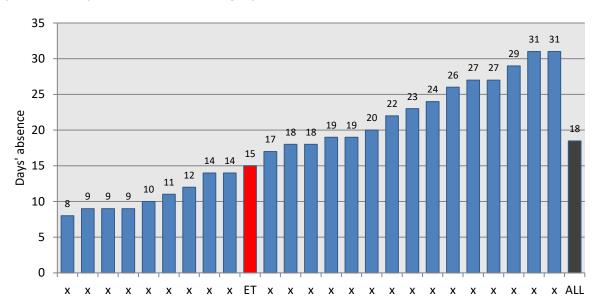


Figure 15. Days' absence for training injuries

6.3 Burden of training injuries

The mean injury burden in training was 36 days' absence/1 000 hours, ranging from 2 to 82 at the various clubs.

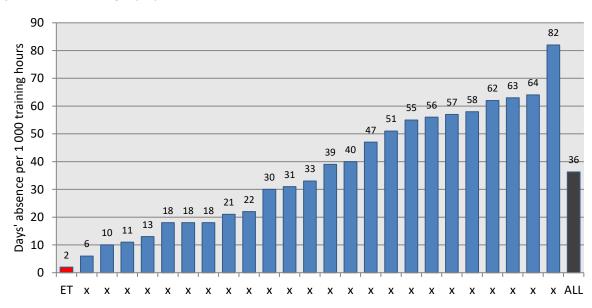


Figure 16. Training injury burden

Figure 17. Training injury burden in previous seasons

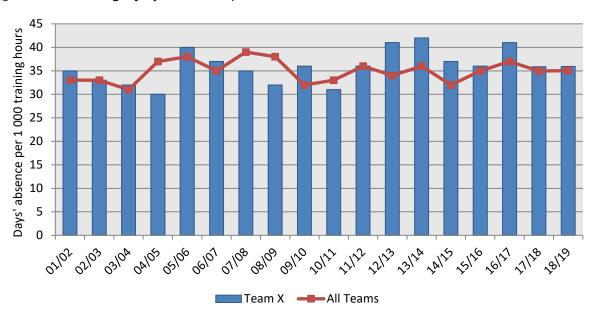
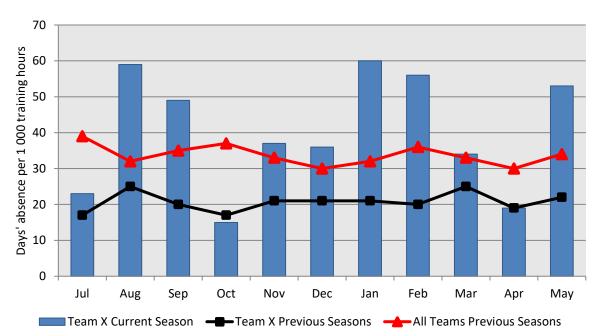


Figure 18. Training injury burden for Team X over the season in comparison to previous seasons



7 Match injuries

7.1 Match injury rate

The mean match injury rate for all teams was 21 injuries for every 1 000 match hours, with individual rates ranging from 8 to 31.

Figure 19. Match injury rate

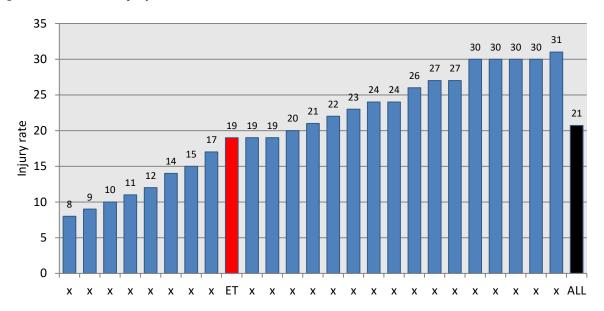


Figure 20. Match injury rates in previous seasons

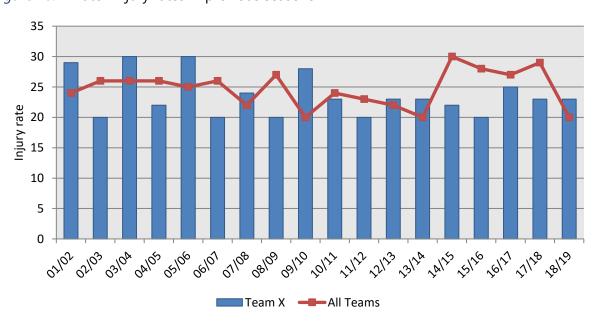
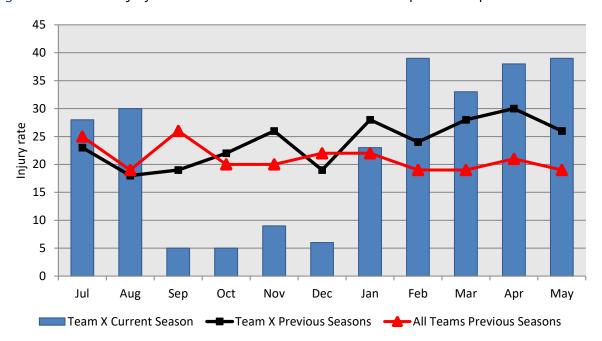


Figure 21. Match injury rate for Team X over the season in comparison to previous seasons



7.2 Days' absence for match injuries

The average absence for match injuries among the teams was 23 days, ranging from 7 to 44 days at the various clubs.

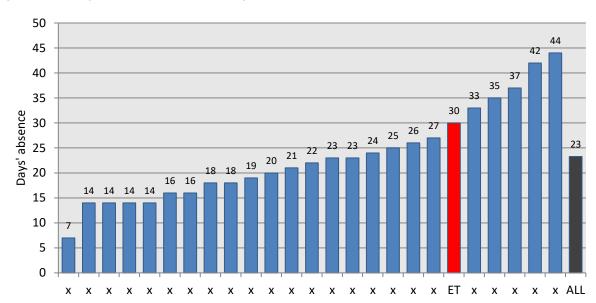


Figure 22. Days' absence for match injuries

7.3 Burden of match injuries

The mean injury burden in match play was 430 days' absence/1 000 hours, ranging from 168 to 694 at the various clubs.

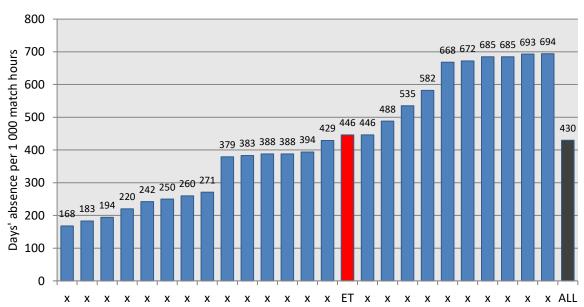


Figure 23. Match injury burden

Figure 24. Match injury burden in previous seasons

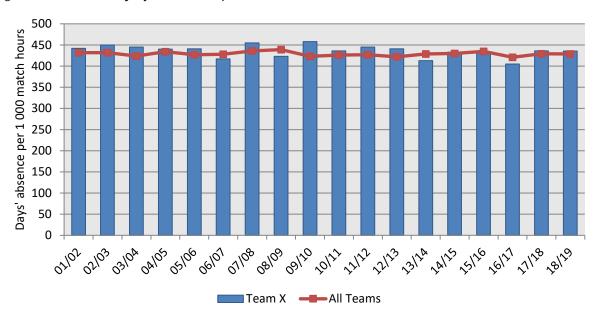
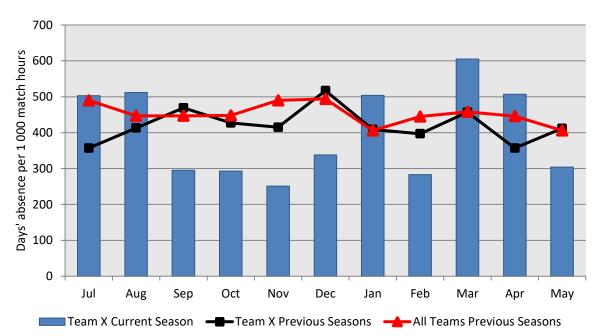


Figure 25. Match injury burden for Team X over the season in comparison to previous seasons



8 Severe injuries

8.1 Severe injury patterns

Injuries resulting in more than four weeks' absence are classified as severe injuries.

Figure 26. Distribution of severe injury locations

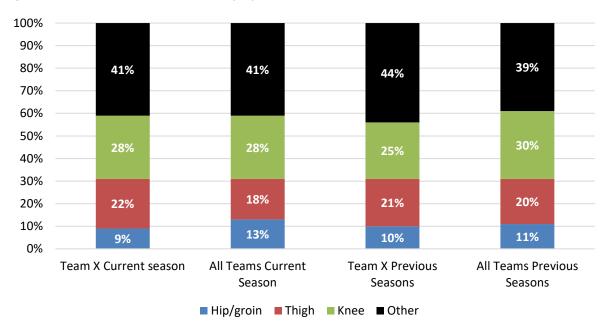
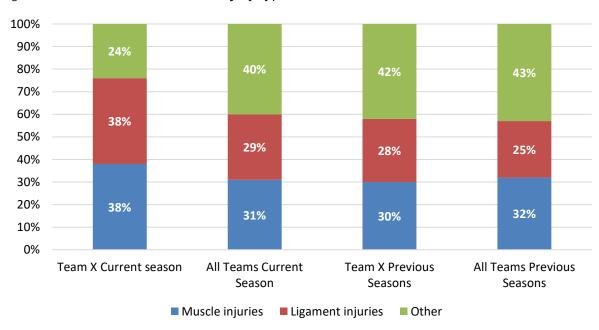


Figure 27. Distribution of severe injury types



8.2 Severe injury rate

The mean severe injury rate for all teams was 1.4 severe injuries for every 1 000 hours, with individual rates ranging from 0.1 to 2.9 Please note that since total absences are unknown where players were still injured at the time of writing, the true figures may differ slightly from those presented here.

Figure 28. Severe injury rate

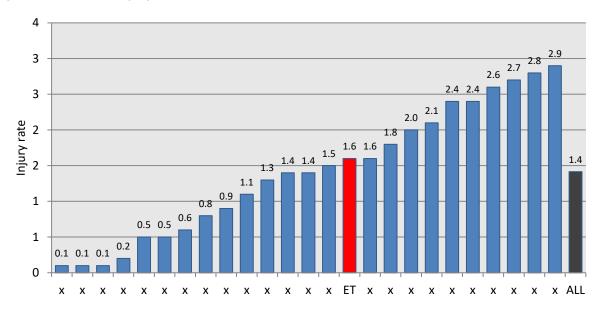


Figure 29. Severe injury rates in previous seasons

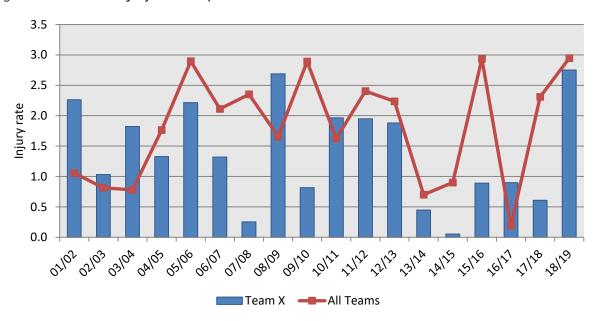
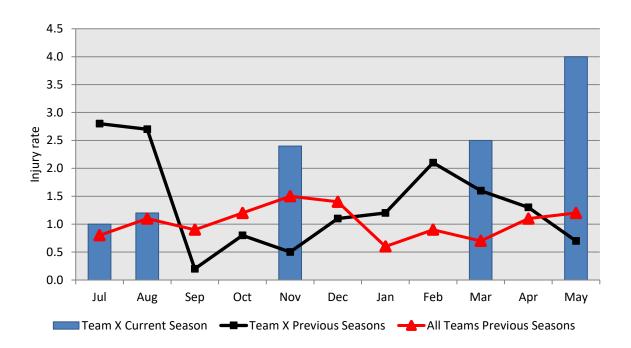


Figure 30. Severe injury rates for Team X over the season in comparison to previous seasons



9 Muscle injuries

9.1 Muscle injury patterns

Figure 31. Distribution of muscle injury locations

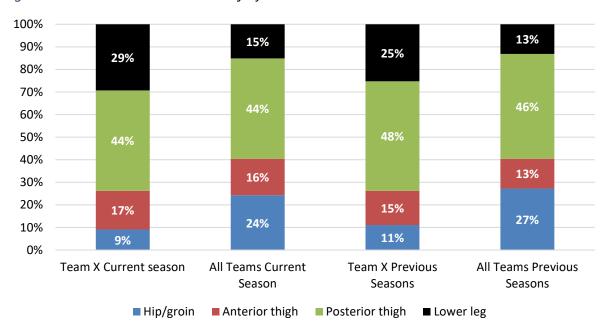
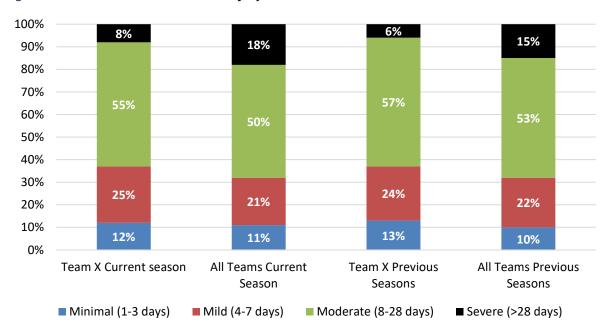


Figure 32. Distribution of muscle injury severities



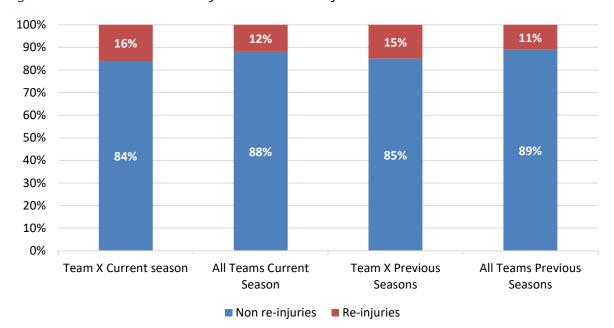
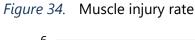


Figure 33. Distribution of re-injuries for muscle injuries

9.2 Muscle injury rate

The mean muscle injury rate for all teams was 2.8 injuries for every 1 000 hours, with individual rates ranging from 0.1 to 5.5.



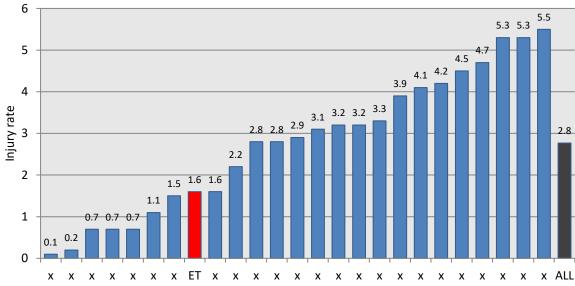


Figure 35. Muscle injury rates in previous seasons

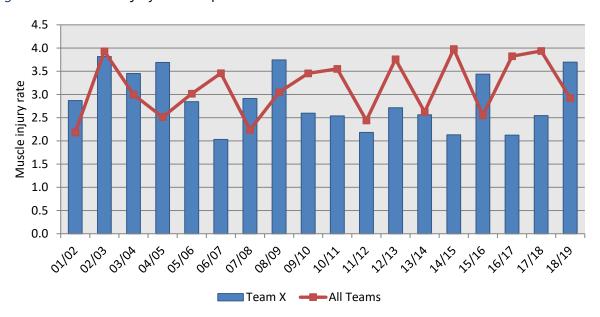
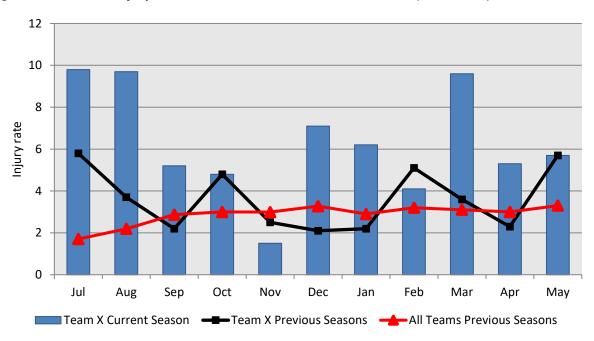


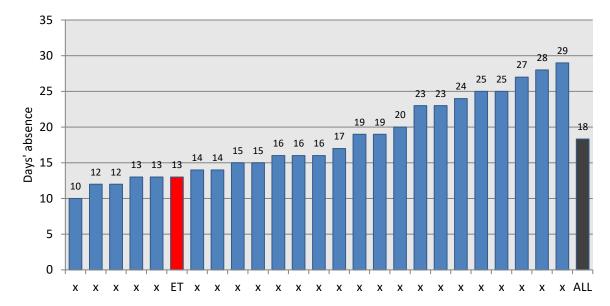
Figure 36. Muscle injury rates for Team X over the season in comparison to previous seasons



9.3 Days' absence for muscle injurie

The average absence for muscle injuries among the teams was 18 days, ranging from 10 to 29 days at the various clubs.

Figure 37. Days' absence for muscle injuries



9.4 Burden of muscle injuries

The mean injury burden for muscle injury was 37 days' absence/1 000 hours, ranging from 12 to 60 at the various clubs.

Figure 38. Muscle injury burden

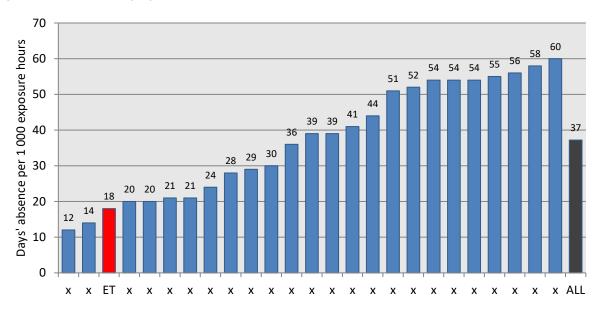


Figure 39. Muscle injury burden in previous seasons

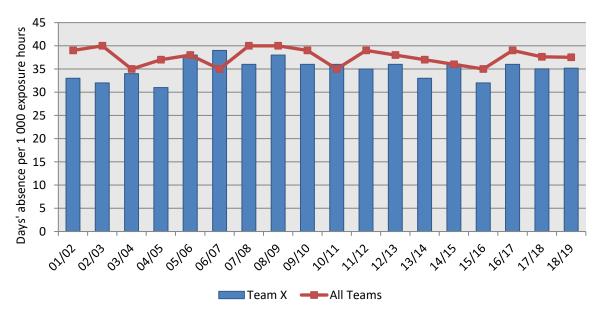
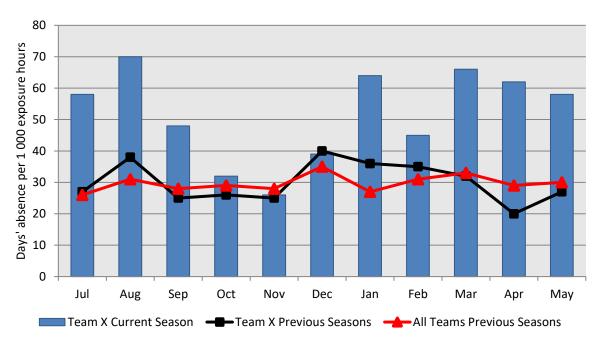


Figure 40. Muscle injury burden for Team X over the season in comparison to previous seasons



10 Ligament injuries

10.1 Ligament injury patterns

Figure 41. Distribution of ligament injury locations

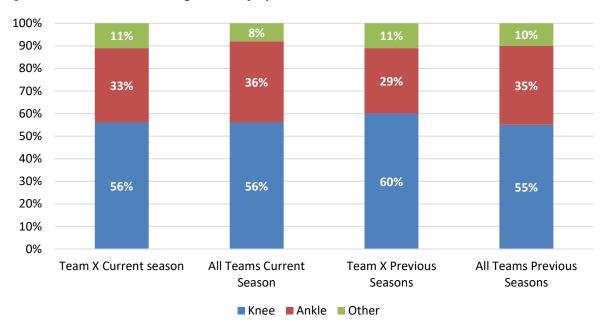
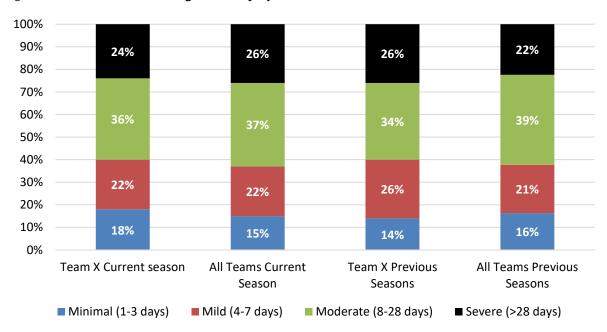


Figure 42. Distribution of ligament injury severities



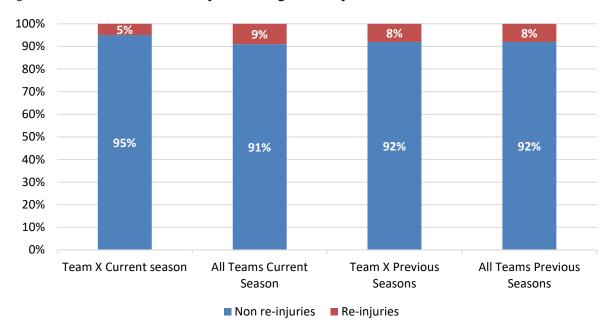


Figure 43. Distribution of re-injuries for ligament injuries

10.2 Ligament injury rate

The mean ligament injury rate for all teams was 1.6 injuries for every 1 000 hours, with individual rates ranging from 0.1 to 2.9 at the various clubs.

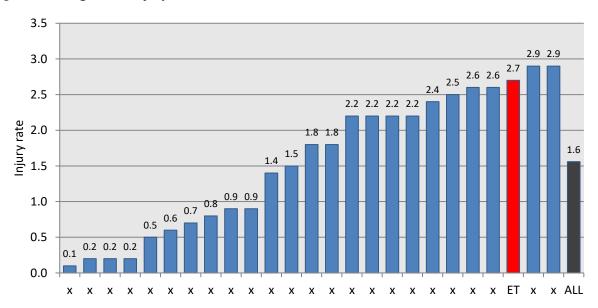


Figure 44. Ligament injury rate

Figure 45. Ligament injury rates in previous seasons

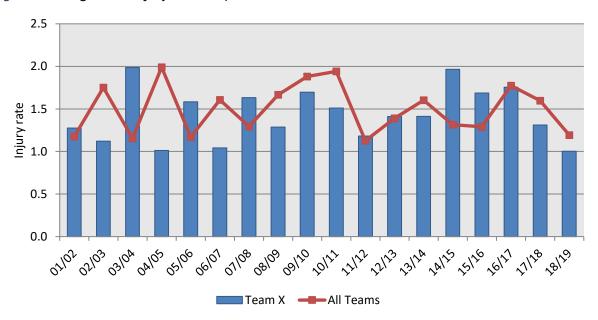
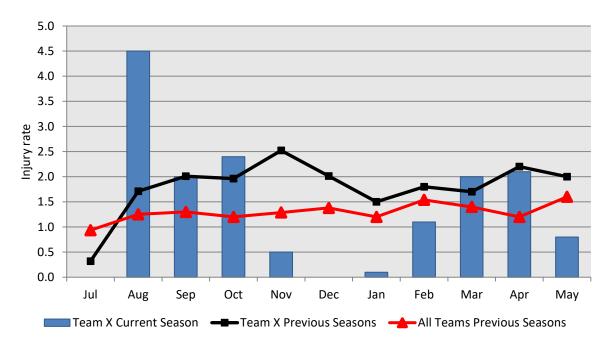


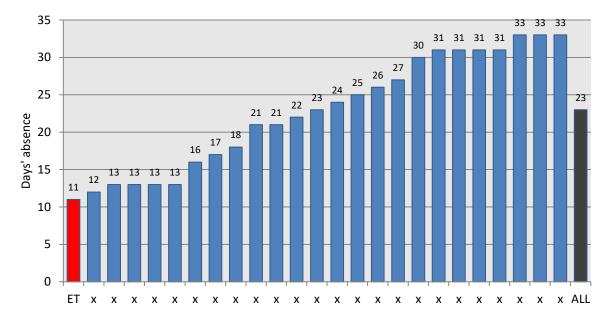
Figure 46. Ligament injury rates for Team X over the season in comparison to previous seasons



10.3 Days' absence for ligament injuries

The average absence for ligament injuries among the teams was 23 days, ranging from 11 to 33 days at the various clubs.

Figure 47. Days' absence for ligament injuries



10.4 Burden of ligament injuries

The mean burden for ligament injury was 35 days' absence/1 000 hours, ranging from 5 to 60 at the various clubs.

Figure 48. Ligament injury burden

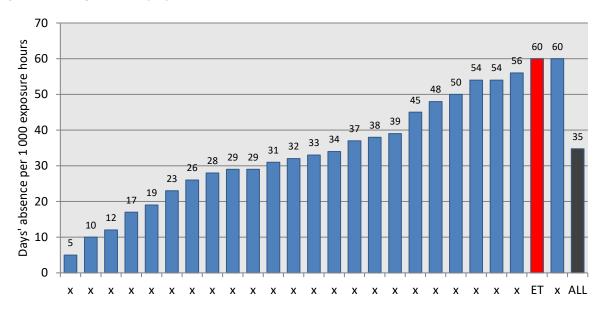


Figure 49. Ligament injury burden in previous seasons

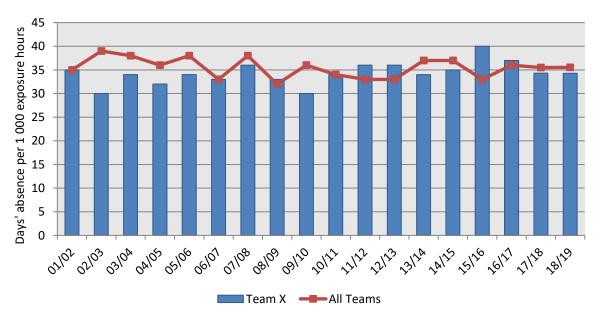
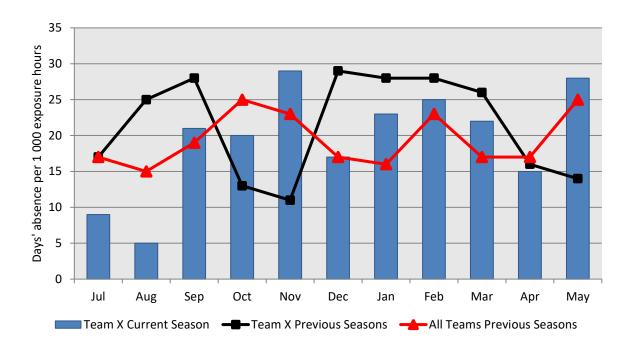


Figure 50. Ligament injury burden for Team X over the season in comparison to previous seasons



11 Re-injuries

11.1 Re-injury patterns

Figure 51. Distribution of re-injury locations

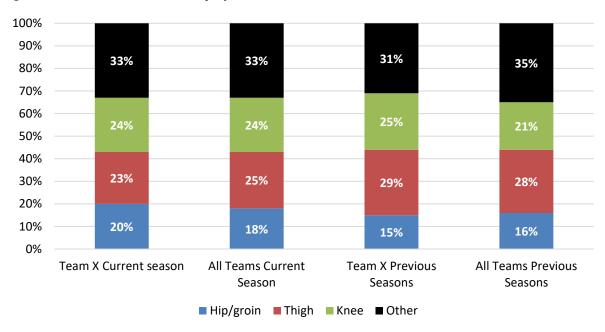
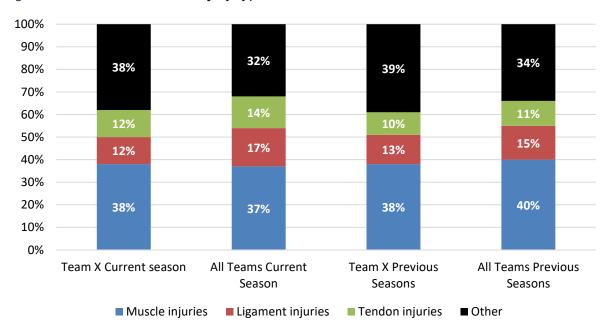


Figure 52. Distribution of re-injury types



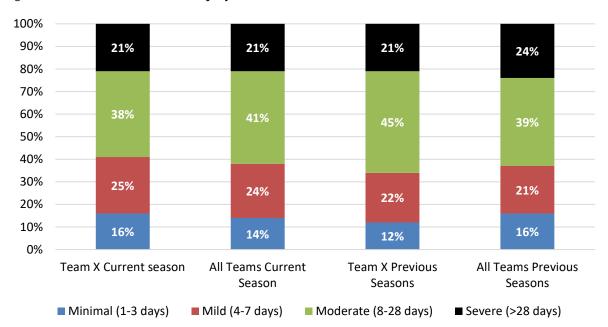


Figure 53. Distribution of re-injury severities

11.2 Re-injury proportion

On average, 16% of injuries sustained were re-injuries, ranging from 5% to 25% at the various clubs.

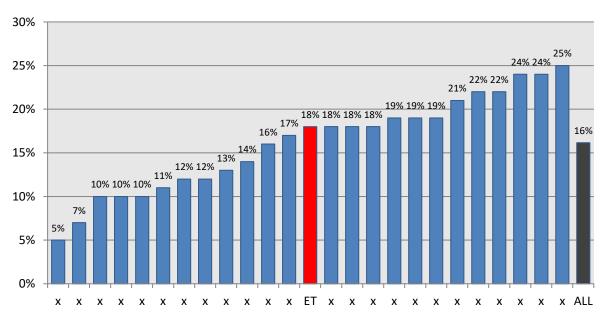
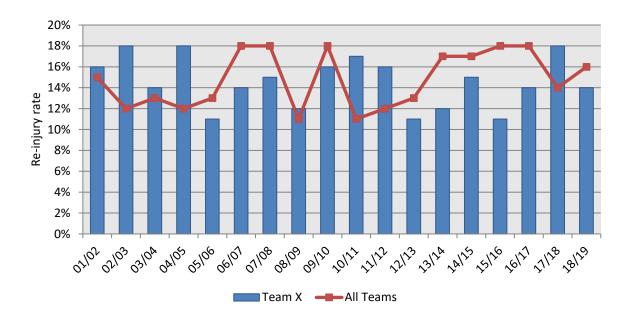


Figure 54. Re-injury proportion

Figure 55. Re-injury proportions in previous seasons



12 Squad attendance/availability and absence

All data in the charts in this section is in the form of percentages.

12.1 Squad attendance/availability

0%

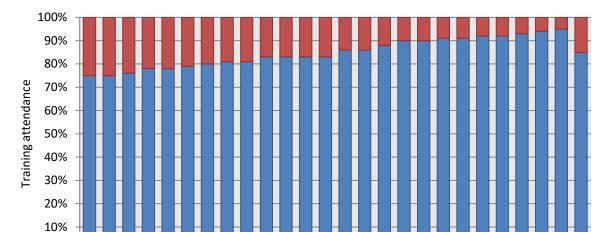
х х

x ET x

 x x x x x x x

■ Training attendance (%)

Squad attendance/availability refers to the average percentage of players who participated in training sessions or were available for match selection over the review period. An attendance/availability rate of 100% would mean that no player was absent because of injury, illness, international duty or any other reason.



Χ

 x x x x x x x x x

■ Training absence (%)

Figure 56. Squad attendance rates for training

Figure 57. Squad attendance rates for training in previous seasons

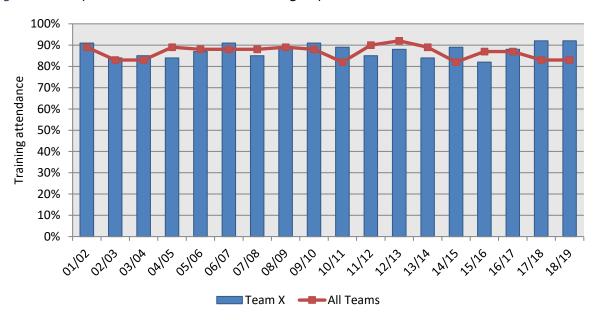


Figure 58. Squad attendance in training for Team X over the season in comparison to previous seasons

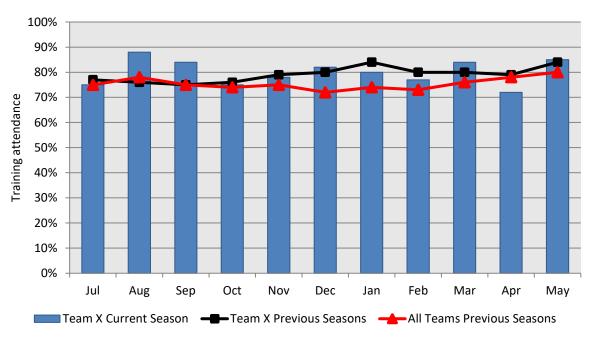


Figure 59. Squad availability rates for matches

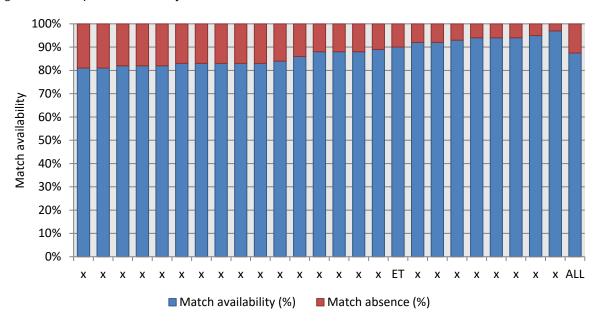


Figure 60. Squad availability rates for matches in previous seasons

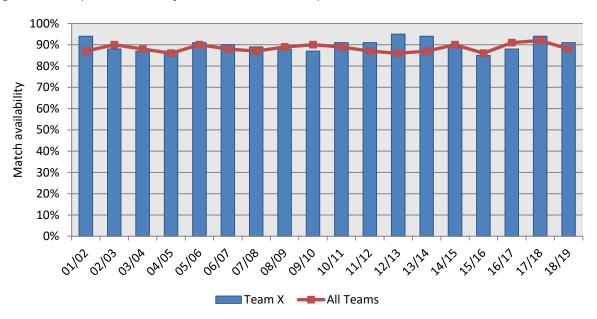
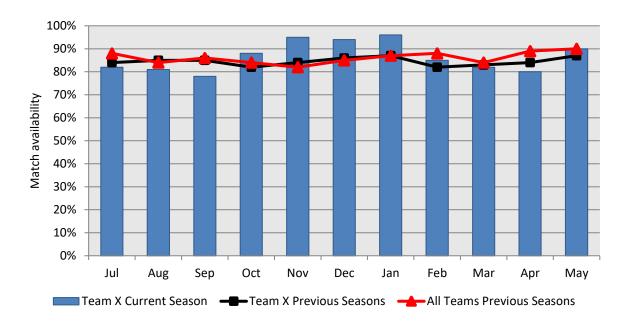


Figure 61. Squad availability for matches for Team X over the season in comparison to previous seasons



12.2 Squad absence

The charts below break players' absences down by reason.

Figure 62. Reasons for absence from training sessions

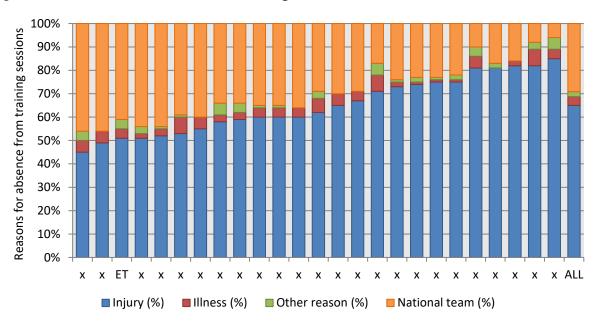
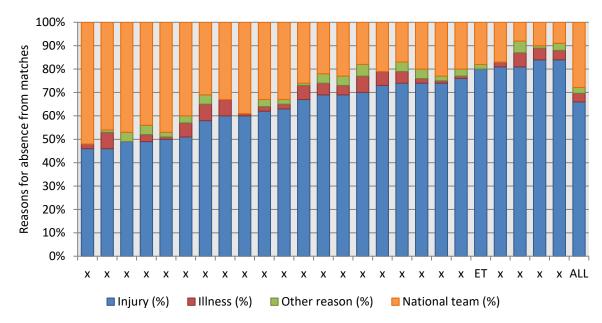


Figure 63. Reasons for absence from matches



12.2.1 Absence due to injury

Figure 64. Absence from training sessions due to injury

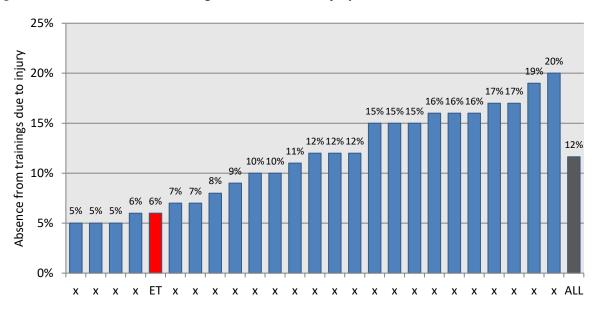


Figure 65. Absence from training sessions due to injury in previous seasons



Figure 66. Absence from training sessions due to injury for Team X over the season in comparison to previous seasons

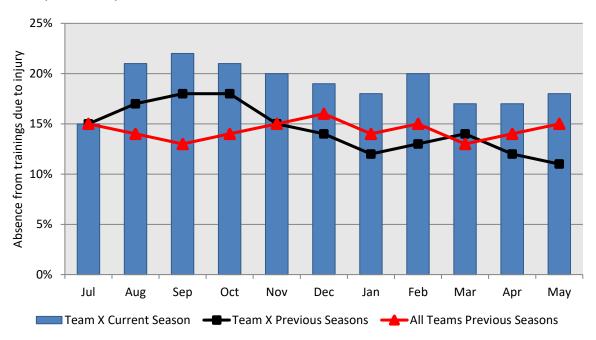


Figure 67. Absence from matches due to injury

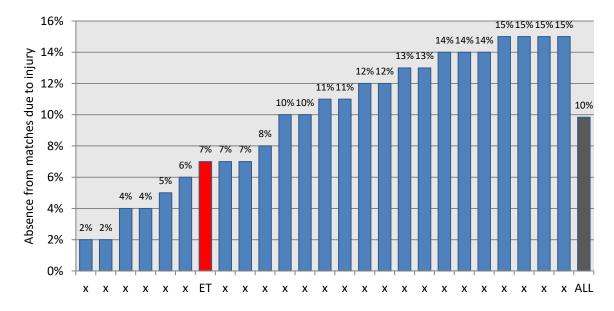


Figure 68. Absence from matches due to injury in previous seasons

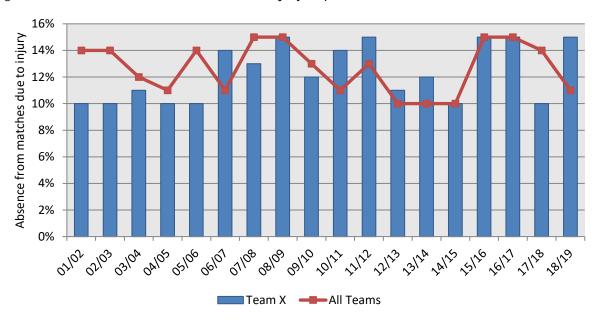
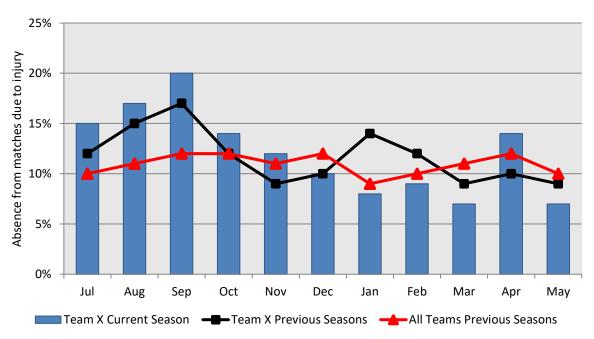


Figure 69. Absence from matches due to injury for Team X over the season in comparison to previous seasons



12.3 Number of training sessions/matches missed because of injury

The consequences of injuries have also been assessed in terms of the number of training sessions and matches that players missed during the review period. On average, across all clubs, each player missed 1.7 training sessions and 0.4 matches each month because of injury. Data specific to each club is presented below.

Figure 70. Number of training sessions missed per player per month owing to injury

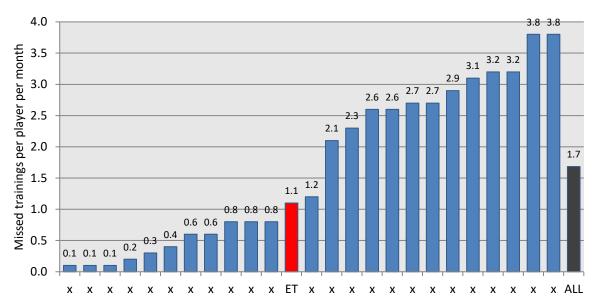


Figure 71. Number of matches missed per player per month owing to injury

