基於 UOF 中文版本 2.3 的 MTS 注单提要集成說明
2019 年十二月

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1. Introduction 简介

The technical integration to Managed Trading Services is performed together with one of Sportradar's MTS Client Integration (CI) engineers using a permanent chat room e.g. Skype or Slack.
有关 MTS 的技术集成将会由其中一位 Sportradar 的 MTS 客户集成工程师通过使用聊天室，例如 Skype 或 Slack 来进行。

During the integration phase the MTS functionality and risk limit configuration will be carried out by representatives from the MTS Operational Account Management (OAM) to ensure the ideal settings are put in place. MTS integration flow, on a high level, is presented in 3 Integration Flow 集成流程.
在集成阶段，MTS 操作帐户管理（OAM）的代表将执行 MTS 功能和风险限制配置，以确保合理的设置。 3 Integration Flow 中简要介绍了 MTS 集成流程。

MTS is Sportradar's service based on UOF which provides risk management for sports and eSports. Communication between the operator's backend and MTS backend is based on asynchronous AMQP communication. JSON objects are used for this communication. In case a Client uses Java or .Net on backend, MTS SDK usage is recommended:
MTS 是 Sportradar 建基于 UOF 上的服务，可为体育项目和电子竞技项目提供风险管理。运营商后台与 MTS 后台之间是通过 AMQP 通信。通信物件为 JSON。如果后台客户端是使用 Java 或.Net，则建议使用 MTS SDK：

- http://sdk.sportradar.com/mts/java
- http://sdk.sportradar.com/mts/net

Ticket acceptance flow is explained in chapter 6.1 Ticket Acceptance Flow 注单接受流程.
注单接受流程在第 6.1 章"注单接受流程"中进行了说明。

After-launch support: 48 hours after the go-live, the client is handed over to Sportradar's support structure to guarantee the best possible service. Our support teams work with a ticketing system, so all e-mails sent to support@sportradar.com will be routed through that and monitored 24/7/365. After emailing our team, a unique ticket number will be appended to the subject line. This may be helpful for future reference when following up on issues or questions.
上线后支援：上线 48 小时后，客户将被移交给 Sportradar 的支援团队，以确保提供最佳服务。我们的支援团队使用订单系统，因此所有发送到 support@sportradar.com 的电子邮件都将通过该系统进行分派并受到 24/7/365 的监控。给我们的团队发送电子邮件后，邮件主题行将附加一个唯一的票号。 在跟进问题时，该票号可以用来帮助参考。

All business relevant communication regarding MTS operations will be handled by a dedicated MTS Operational Account Manager (OAM). In case of off hours, you can address issues to mts-client-management@sportradar.com.
与 MTS 运营有关的通信将由专门的 MTS 运营客户经理（OAM）处理。在非办公时间，您可以将问题发送到 mts-client-management@sportradar.com。
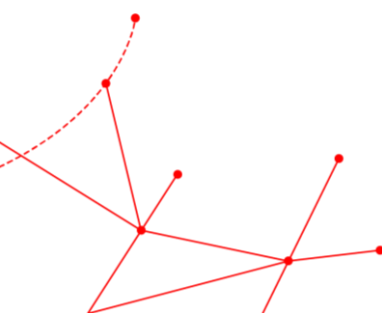
2. Pre-conditions 前提条件

- Commercials are agreed 双方同意商业协定
- Operator or Platform provider is ready to start technical integration 运营商或平台提供商已准备好开始技术集成

Note: It is not required to have integrated UOF to start MTS Integration. MTS Integration and UOF integration can be completed in parallel.
注意：不需要完成 UOF 集成才启动 MTS 集成。 MTS 集成和 UOF 集成可以并行完成。

3. Integration Flow 集成流程

Figure 3-1 Integration Flow
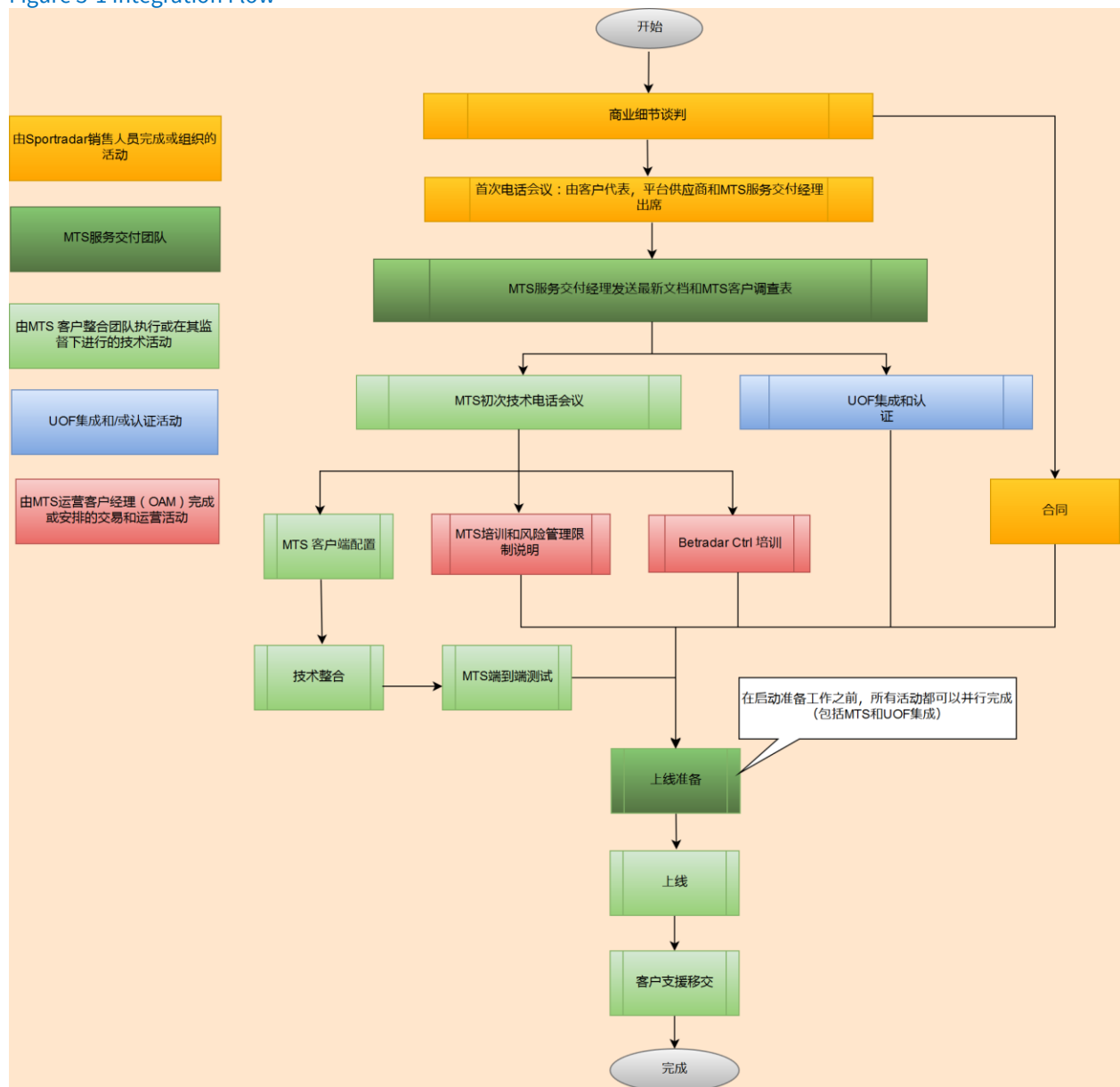
1. The first interaction between an MTS Client and the MTS Service Delivery team commences with an MTS kick off call. This call is arranged by the relevant Betradar's Sales person after commercial details were agreed. Participants of the kick-off call should be the representatives of the operator, platform provider, MTS Service Delivery and MTS Operational Account Manager (OAM) teams. The following will be discussed during this call:
   MTS 客户与 MTS 服务交付团队之间的首次互动始于 MTS 首发电话会议。在作出商业协定之后，此电话会议由相关的 Betradar 销售人员安排。 启动电话会议的参与者应该是运营商，平台提供商，MTS 服务交付和 MTS 运营客户经理（OAM）团队的代表。 在通话期间将讨论以下内容：
   a. The MTS integration flow;
      MTS 集成流程
   b. Date for starting integration and planned launch date. Please note resources are planned within the MTS Client Integration (CI) team based on these dates;
      开始集成的日期和计划上线日期。 请注意，MTS 客户端集成（CI）团队将根据这些日期制定计划；
   c. Scheduling of the initial technical call with developers from the MTS client side and MTS CI engineers.
      与 MTS 客户端的开发人员和 MTS CI 工程师一起安排初始技术电话会议。
2. After the kick-off call the MTS Service Delivery manager:
   首次电话会议后，MTS 服务交付经理将会：
   a. Creates a dedicated Skype or Slack chat which is used for communication with MTS Client Integration team during the MTS integration phase;
      创建专用的 Skype 或 Slack 聊天群组，用于在 MTS 集成阶段与客户进行通信；
   b. Sends the latest version of the MTS ticket integration document and AMQP ticket feed documentation on the client;
      发送客户最新版本的 MTS 集成文档和 AMQP 订单文档；
   c. Sends MTS client questionnaires to the client;
      向客户发送 MTS 客户问卷；
   d. Introduces the client to the Betradar Partner Certification team. This team is responsible for UOF certification. Feed certification is one of the prerequisites for the launch of the MTS service.
      向客户介绍 Betradar 合作伙伴认证团队。该团队负责 UOF 认证。数据认证是启动 MTS 服务的先决条件之一。
3. Technical client integration starts with an initial Skype or Slack conference call. Participants of this call are the MTS CI team and a technical representative(s) from the client's side. The following will be discussed during this call:
   客户的技术集成始于最初的 Skype 或 Slack 电话会议。 此次电话会议的参与者是 MTS CI 团队以及客户方面的技术代表。 在通话期间将讨论以下内容：
   a. Integration flow
      集成流程
   b. Ticket acceptance flow which is explained in chapter 6.1 Ticket Acceptance Flow 注单接受流程**注单接受流程在第** 6.1 **章"注单接受流程"中进行了说明。**
   c. Benefits of using MTS Java or .Net SDK.
      使用 MTS Java 或.Net SDK 的好处。
      i. In case MTS SDK cannot be used, AMQP communication concept between the client's platform and MTS
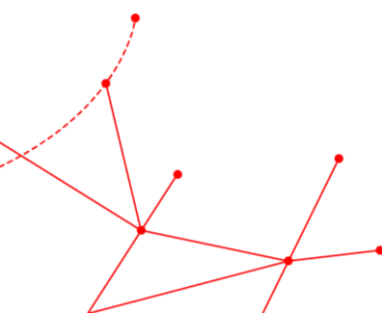
如果无法使用 MTS SDK，则客户端平台和 MTS 之间便要使用 AMQP 的通信模式

d. Possibility of sending production tickets to the MTS CI environment without following MTS suggestions/replies for testing purposes
在测试的情况下，可以将生成的注单发送到 MTS CI 环境而不需要遵循 MTS 的建议/回答

e. Frequently asked questions for integration or launch.
集成或上线的常见问题。

4. After the MTS CI Lead receives a completed technical questionnaire and client's public GPG key (OpenPGP format) from the client, the **Client Configuration on MTS CI** phase starts with:
在 MTS CI 负责人收到客户完成的技术问卷和客户的公共 GPG 密钥（OpenPGP 格式）后，" MTS CI"阶段的"客户配置"便开始：

a. Client's bookmaker account (BMID) is subscribed to Managed Trading Services
客户的庄家帐户（BMID）连接上 MTS

b. Client's IPs are added to MTS CI environment whitelists (**Note**: Any additional IP white-listening requests have to be sent to MTS CI via email: mts-clientintegration@sportradar.com)
客户端的 IP 被添加到 MTS CI 环境白名单中（注意：任何其他 IP 白名单请求都必须通过电子邮件发送至 MTS CI：mts-clientintegration@sportradar.com）

c. MTS CI team sets up RabbitMQ for the client's ticket feed to MTS CI environment
MTS CI 团队设置 RabbitMQ 以读取客户在 MTS CI 环境上的注单数据

d. Appropriate Limit IDs are created on MTS CI environment.
在 MTS CI 环境上创建适当的限额 ID。

Note: It might happen that several Limit IDs will be created for the same client. E.g. separate Limit IDs for different distribution channels. This fact must be taken into account during development.
注意：可能会为同一个客户创建多个限额 ID。 例如。 不同分发渠道的单独限额 ID。 在开发过程中必须考虑到这一事实。

5. Credentials encrypted with GPG are sent to the pre-agreed recipient. More about GPG encryption can be found here: https://www.gnupg.org/gph/en/manual/x110.html or http://www.gpg4win.org/
使用 GPG 加密的凭据将发送到预先指定的收件人。 有关 GPG 加密的更多信息，请参见：https：//www.gnupg.org/gph/zh-CN/manual/x110.html 或 http://www.gpg4win.org/

Note: In case of credentials being lost or compromised, they cannot be restored or reused. If credentials are lost or compromised, new credentials will be created.
注意：如果密钥丢失或被破坏，则无法还原或重新使用它们。 如果密钥丢失或被破坏，将创建新的密钥。

6. After the Client receives AMQP credentials and limitIDs, the Client integrates the ticket feed to MTS with support from MTS CI team in a dedicated Skype chat. This phase is called **Technical Integration**.
客户收到 AMQP 密钥和权限 ID 后，客户会在专用的 Skype 聊天群中，在 MTS CI 团队的支援下将注单数据集成到 MTS。 此阶段称为技术集成。

7. In parallel to the ticket feed implementation, the MTS OAM manager is
与此期间，MTS OAM 经理将会：
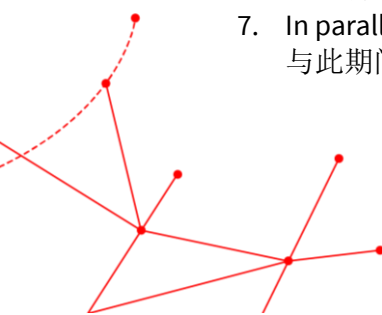
a. discussing risk limits setup and ticket cancellation configuration for the MTS production environment:
讨论 MTS 生产环境的风险限额设置和注单取消配置：

    i. Minimum stake limit
最低投注金额

    ii. Maximum stake limit
最高投注金额

    iii. Maximum payout limit
最高派彩金额

    iv. Maximum liability limit
最高赔付金额

    v. Live and Pre-match bet factors
滚球和赛前下注因素

    vi. Live time delay
滚球时间延迟

    vii. Bet cancellation types
投注取消类型

    viii. Acknowledgement period
确认期

Note: The prerequisite is a completed MTS client questionnaire by the client.
注意：先决条件是客户填写完整的 MTS 客户问卷。

b. Arranging Betradar Ctrl training. This training is about Betradar feeds configuration from a business and operational perspective (e.g. odds key/configuration).
安排 Betradar Ctrl 培训。 该培训是从业务和运营角度对 Betradar 服务进行配置（例如，赔率/配置）。

8. In parallel to the MTS CI and OAM activities, the Betradar Partner Certification team is performing the UOF certification on the client's platform.
在 MTS CI 和 OAM 活动并行的同时，Betradar 合作伙伴认证团队会在客户平台上执行 UOF 认证。

9. After the client has completed the MTS ticket feed implementation, an end-to-end test is performed by MTS CI team which includes:
在客户完成 MTS 订单数据集成后，MTS CI 团队将进行端到端测试，其中包括：

a. Placing bets on the client's sportsbook solution and verifying ticket JSON objects on the MTS side
在客户的投注平台上下注，并在 MTS 后台验证 JSON 订单

b. Verification of reaction to bet acceptance suggestion (bet accepted or rejected)
验证对订单接受建议的反应（投注接受还是拒绝）

c. Verification of quality of UOF integration (if the client can send production tickets to the MTS CI environment)
验证 UOF 集成质量（客户是否可以将正式注单送到 MTS CI 环境）

Note: Issues found during the test will require correction by the client or provision of an estimated time for issue resolution.
注意：在测试过程中发现的问题将需要客户进行纠正或提供预计解决问题的时间。

Note: Although not mandatory, it is recommended to have the feed certification completed before the start of end to end testing. In exceptional circumstances end to end testing can start before feed certification, if the certification date has been scheduled.
注意：尽管不是强制性的，但建议在开始端到端测试之前先完成数据认证。 在特殊情况下，如果已经安排了认证日期，则可以在数据认证之前开始进行端到端测试。

10. After successful completion of the end-to-end testing, launch preparation phase starts which includes:
    成功完成端到端测试后，上线准备阶段将开始，其中包括：
    a. Review of MTS end-to-end test results by MTS Service Delivery manager
       MTS 服务交付经理查看 MTS 端到端测试结果
    b. Review of UOF certification results by Betradar Partner Certification team and MTS Service Delivery managers
       Betradar 合作伙伴认证团队和 MTS 服务交付经理审核 UOF 认证结果
    c. Contract finalization by MTS Business Development Manager, Assistant and Sportradar Legal department
       MTS 业务发展经理，助理和 Sportradar 法务部门确定合同
    d. Verification of Risk Management limits
       验证风险管理限制
    e. Verification of UOF configuration by MTS OAM
       MTS OAM 验证 UOF 配置
    f. Client is configured on MTS production environment
       客户在 MTS 正式环境上配置

11. With MTS end-to-end testing, UOF certification completed and a signed MTS contract, launch date is agreed with the Client and MTS Service Delivery manager
    通过 MTS 端到端测试，完成 UOF 认证并签署了 MTS 合同后，客户和 MTS 服务交付经理商定上线日期

12. The launch confirmation email is followed by MTS production credentials encrypted with GPG
    启动确认电子邮件包含了使用 GPG 加密后的 MTS 生产凭证

13. After agreed date and time, MTS CI team assists Operator to switch sportsbook to MTS Production
    在约定的日期和时间，MTS CI 团队将协助运营商将体育博彩平台转换为 MTS 正式环境

14. For the first 48 hours after launch, MTS CI supports and monitors the client directly. After 48 hours, client support is handed over to the Sportradar Support Team. Any issues from then on should be addressed directly to Sportradar Support.
    在正式启动后的 48 小时内，MTS CI 直接支持和监视客户端。 48 小时后，客户支持将移交给 Sportradar 支援团队。 此后的任何问题都应直接与 Sportradar 支持联系。

Note: By default, all tickets coming to MTS production are assumed as genuine production tickets and will be invoiced accordingly. All testing, demos and training for any employee must be carried out via the MTS CI environment.
注意：默认情况下，所有在 MTS 正式环境下产生的注单均视为真实的票据，并将据此开具发票。 任何员工的所有测试，演示和培训都必须通过 MTS CI 环境进行。
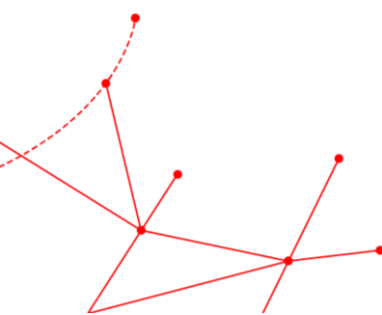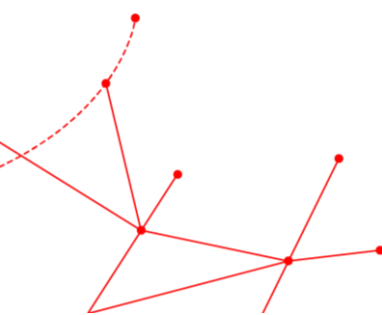
3.1. UOF Certification UOF 认证

Quality validation of UOF integration to the client's platform is part of the integration with MTS which is completed by the Betradar Partner Certification program team. This activity aims to reduce the number of bets sent to MTS with outdated data: status of event, market, selections and odds values. After feeds certification is scheduled, one iteration of feed certification takes no longer than 5 business days. If there are issues during the process, another iteration will be scheduled once a defined plan for the fix is made available.

UOF 集成的质量验证是 MTS 集成的一部分, 这部分是由 Betradar 合作伙伴认证计划团队完成的。 该活动旨在减少发送过时投注数据给 MTS：赛事状态，玩法，订单选择和赔率值等。 数据认证时间安排好后，一次迭代的时间将不超过 5 个工作日。 如果在此过程中存在问题，会安排**修复计划**，**修复后**将安排另一个迭代直至修复成功。

For further details please contact partner-certification@sportradar.com.

有关更多**详细信息**，请联系 partner-certification@sportradar.com。

Note: It is not required to have integrated UOF to start MTS Integration. MTS Integration and UOF integration can be completed in parallel.

注意：不需要集成 UOF 即可启动 MTS 集成。 MTS 集成和 UOF 集成可以并行完成。

4. Contacts 联络人

Technical assistance: 技术援助：
The MTS CI team is supporting the client throughout the entire MTS integration period and for the first 48 hours directly after the launch. The MTS CI team is available during the integration period via a dedicated Skype/Slack chat room or by email: mts-clientintegration@sportradar.com.
MTS CI 团队将在整个 MTS 集成期间以及启动后的 48 小时内为客户提供支持。 在集成期间，可以通过专用的 Skype / Slack 聊天室或通过电子邮件 mts-clientintegration@sportradar.com 与 MTS CI 团队联系。

Support for production issues: 正式环境使用问题：
After launch support period of 48 hours has passed, support is then handed over to our standard 24/7 Sportradar Support Team (via email support@sportradar.com) who will ensure support availability and issue management.
在 48 小时的启动支援期过后，支援将移交给我们的 24 小时 Sportradar 支援团队（通过电子邮件 support@sportradar.com），他们将提供客户支持和问题管理。

For all enquiries relating to the usage of the Sportradar feeds and other Services, it is recommended to contact Sportradar Support directly.
所有有关使用 Sportradar 数据和其他服务的问题，建议直接联系 Sportradar 支援团队。

UOF certification: UOF certification:
Main contact for UOF certification: partner-certification@sportradar.com.
UOF 认证的主要联系人：partner-certification@sportradar.com。

Operational: 操作：
In the case of any operational issues, please contact the MTS Operational Account Manager (OAM): mts-clientintegration@sportradar.com.
如果出现任何运营问题，请与 MTS 操作客户经理（OAM）联系：mts-clientintegration@sportradar.com。

MTS Business development: MTS 业务发展：
In case of contractual or commercial topics please email: mts-businessdevelopment@sportradar.com.
如果是合同或商业问题，请发送电子邮件至：mts-businessdevelopment@sportradar.com。
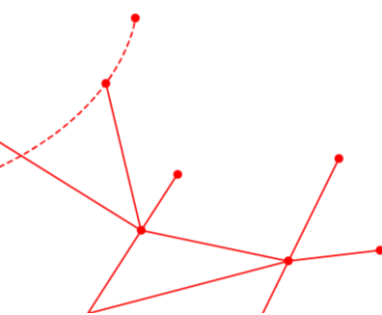
5. Connectivity 连接性

5.1. Connection Endpoints 连接端口

Client integration environment 測試環境 (AMQP over TLS 1.2 secure connection)
Host   **mtsgate-ci.betradar.com**
Port   **5671**

Production environment 正式環境 (AMQP over TLS 1.2 secure connection)
Host   **mtsgate-t1.betradar.com**
Port   **5671**

5.2. AMQP Protocol and MTS SDK

MTS protocol is delivered via AMQP messaging protocol.
MTS 协议是通过 AMQP 消息传递协议传递的。

For .NET and Java clients, the preferred and most convenient means of integration is through MTS SDK library:
对于.NET 和 Java 客户端，首选和最方便的集成方式是通过 MTS SDK：

- http://sdk.sportradar.com/mts/net
- http://sdk.sportradar.com/mts/java

Please refer to **MTS Java SDK Developer Guide** and **MTS .NET SDK Developer Guide** for a quick way to get you started.
请参考《MTS Java SDK 开发人员指南》和《MTS .NET SDK 开发人员指南》，以快速入门。

For other languages please consult **MTS-integration with AMQP** where you will be able to find all the information regarding messaging principles with AMQP, as well as initial hints on how to approach the first MTS AMQP messaging setup. Important MTS specific knowledge and illustrative code examples are also included, with more advanced links and hints to help you progress with MTS integration on the protocol level.
对于其他语言，请查阅 **MTS-integration with AMQP**，在这里您将能够找到有关 AMQP 消息传递原理的所有信息，以及有关如何进行第一个 MTS AMQP 消息传递设置的初步提示。 还包括重要的 MTS 特定知识和说明性的代码示例，以及更高级的连接和提示，以帮助您在协议级别上进行 MTS 集成。

MTS "Border" RabbitMQ cluster is running version 3.7.x, which should guide you when choosing a compatible AMQP client library.

MTS"边界"RabbitMQ 群集正在运行 3.7.x 版，它可以在您选择兼容的 AMQP 客户端库时进行指导。
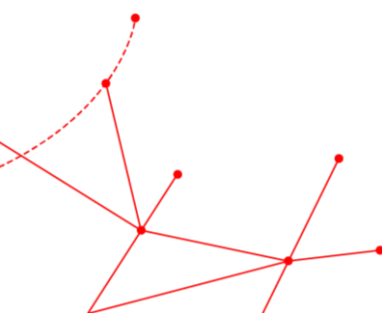
6. The Ticket Transfer Protocol 注单转让协议

6.1. Ticket Acceptance Flow 注单接受流程

The ticket acceptance flow (which is reflected in diagram <u>Figure 6-1 Ticket Acceptance Flow</u> on page 14 is described below: 注单接受流程（反映在第 14 页的图 6-1 中）：
1. Ticket is assembled as a JSON object and sent to MTS.
   注单被组装为 JSON 物体并发送到 MTS。

Note: In case of MTS SDK, it is done by MTS SDK. This is one of many benefits of MTS SDK.
注意：**如果是** MTS SDK, **则由** MTS SDK **完成。 这是** MTS SDK **的众多优点之一。**

2. MTS sends consumer acknowledgement (AMQP basic ack) in case message is received by MTS
   如果 MTS 收到消息，则 MTS 发送消费者确认（AMQP 基本确认）
   – If the consumer acknowledgement is not received on the client side, then it should be considered that MTS didn't receive the initial message with the JSON ticket.
     如果未在客户端收到消费者确认，则应理解为 MTS 没有收到带有 JSON 物体的初始消息。
3. After the ticket is received, MTS responds with suggestion as to whether the ticket should be accepted or rejected. (Average response time is 25 ms).
   收到注单后，MTS 会建议您接受还是拒绝该投注。 （平均响应时间为 25 ms）。

Note: In the case of live bets, MTS applies a live time delay of up to 15 seconds.
注意：**在滚球投注的情况下，** MTS **会采用最多** 15 **秒的滚球**时间**延迟。**
   – If the Client does not receive a reply within 3 seconds (pre-match) and 16 seconds (live) then the client/operator should reject the bet and send timeout triggered bet cancellation 102 to MTS.
     如果客户未在 3 秒（赛前）和 16 秒（滚球）内收到答复，则客户/运营商应拒绝该投注并将因超时而触发的投注取消代号 102 发送给 MTS。
4. After the Client/Operator receives a bet acceptance/rejection suggestion then the flow is split into two branches which are reviewed in separate chapters as detailed below.
   客户/操作员收到投注接受/拒绝建议后，流程将分为两个分支，分别在以下章节中进行详细介绍。

6.1.1. MTS Accepts the Ticket MTS 接受投注

By default, we (MTS) are expecting that the client is following MTS suggestion. In other words, if MTS accepts the bet then the same bet should be accepted by the Client. If there is a need to reject a bet which was accepted by MTS, then:
默认情况下，我们（MTS）期望客户遵循 MTS 建议。 换句话说，如果 MTS 接受该投注，则客户应接受相同的投注。 如果需要拒绝 MTS 接受的投注，则：
1. A bet cancellation request should be sent to MTS.
   取消投注的请求应发送到 MTS。
   Note: There are different bet cancellation types for a variety of business and technical flows. For more details see Chapter <u>6.5 Ticket Cancellation</u> 注单取消.
   注意：针对各种业务和技术流程，有不同的取消投注类型。 有关更多详细信息，请参见第 6.5 章"注单取消"。
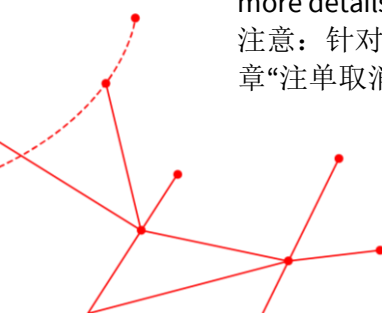
2. If a bet cancellation request is accepted by MTS, then
   如果 MTS 接受取消投注的请求，则
       a. The Client rejects the bet.
          客户拒绝下注。
       b. After the bet is rejected on the client's side then the appropriate Acknowledgement message is sent to MTS to confirm that the bet was rejected.
          在客户方拒绝了投注之后，相应的确认消息将发送到 MTS 以确认投注被拒绝了。
3. If a bet cancellation request is declined by MTS, then the client should retain the bet as accepted.
   如果 MTS 拒绝取消投注要求，则客户应接受此投注。
       a. If the bet still needs to be rejected, then the client should contact the MTS Operational Account Manager (OAM): mts-client-management@sportradar.com.
          如果仍然需要拒绝该投注，则客户应联系 MTS 运营客户经理（OAM）: mts-client-management@sportradar.com。

6.1.2. MTS Rejects the Ticket MTS 拒绝投注

If MTS rejects the bet, then we (MTS) are expecting that the client also rejects the bet. If there is a need to accept a bet which was rejected by MTS, then the client should send the appropriate Acknowledgment message to MTS, but MTS will not share the risk for such tickets. For cases when bet was rejected due to risk management reasons, MTS offers Alternative Stake (for live and pre-match) and Bet re-offer (for pre-match) functionalities.
如果 MTS 拒绝投注，那么我们（MTS）期望客户也拒绝投注。 如果需要接受被 MTS 拒绝的投注，则客户应向 MTS 发送适当的确认消息，但 MTS 不会承担此类订单的风险。 对于由于风险管理原因而拒绝投注的情况，MTS 提供替代投注（滚球和赛前比赛）和投注重新报价（赛前）功能。

Figure 6-1 Ticket Acceptance Flow
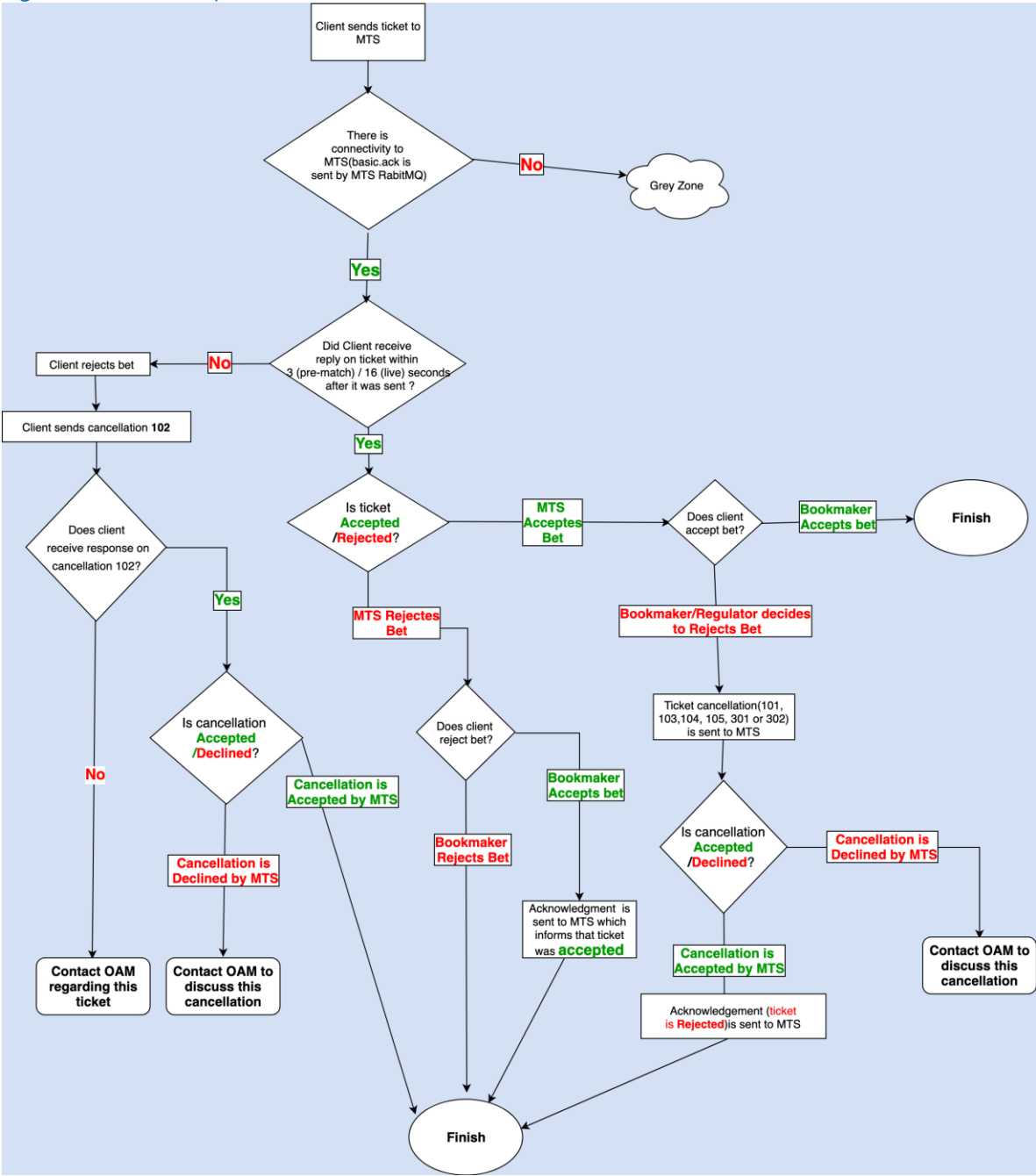
6.2.   Alternative Stake 替代注额

If a bet is rejected due to exceeded liability limits, MTS gives the end customer the chance of requesting the bet again with a lower stake which would have more chance of being accepted. After the first rejection, MTS sends, together with the reply, an alternative stake value. The bookmaker can then offer the end customer the chance of requesting the same bet with the alternative stake.
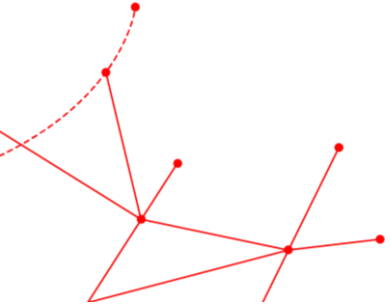
如果由於超出責任限額而拒絕投注，MTS 將為最終客戶提供機會，可以通过較低的投注額再次要求投注，這將有更大可能訂單被接受。 第一次拒絕後，MTS 會與答復一起發送替代權益值。 然後，莊家可以為最終客戶提供與其他投注要求相同投注的機會。

Note: Alternative stake is available for live and pre-match betting.
注意：滚球投注和赛前投注都可以使用其替代注额。

Note: MTS can have enabled either alternative stake functionality for live and pre-match or bet re-offer for pre-match. For further details please contact MTS OAM team.
注意：MTS 可以為滚球比賽和賽前比賽啟用替代注額功能，也可以為賽前盘啟用投注重新報價。有關更多詳細信息，請聯繫 MTS OAM 團隊。

The alternative stake does not reserve liability; therefore, if the aggregated liability amount increases before the end customer accepts to place the bet with the Alternative Stake, the ticket might be rejected again.
替代注额不承担责任；因此，如果在最终客户接受以替代赌注额进行下注之前总负债金额增加，则该投注可能会再次被拒绝。

High level flow:
高级别流程：

1. Ticket is sent from operator to MTS
   注单从运营商发送到 MTS
2. Ticket gets rejected due to exceeded liability
   注单因超出责任范围而被拒绝
3. Rejection message is sent to the bookmaker and contains the Alternative Stake offer in the currency of the initial bet and an ID in order to identify the rejected ticket.
   拒绝消息发送给庄家，其中包含以初始投注货币替代赌注单和 ID，以识别被拒绝的投注。
4. The new ticket placed with the Alternative Stake must contain the ID of the previous ticket rejected for liability reasons (see (3)).
   带有替代注额的新注单必须包含由于责任原因而被拒绝的前一张注单的 ID（请参阅（3））

Alternative stake works in the following cases:
在以下情况，替代注额会生效：
− Alternative stake is triggered for the following rejection codes: -308, -511, -512, -701, -702, -703
  当这些拒絕代碼出现，替代赌注便会产生：-308，-511，-512，-701，-702，-703
− Bet types: Singles, Multiples (accumulators)
  投注类型：單选，多选（过关）
− For the time being, MTS is not offering alternative stake for the tickets which contain several bets
  目前，MTS 不能为包含多个投注的注单提供替代注额

Note: By default, the alternative stake functionality is disabled on the MTS side. If you would like it to be activated, please contact the MTS OAM team.
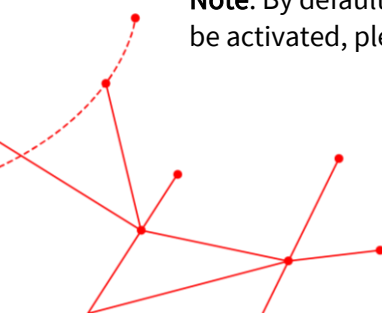
注意：默认情况下，替代注额在 MTS 端是处于关闭状态。**如果您希望激活它，请联系 MTS OAM 团队。**

6.3. Bet Re-offer for Pre-match 赛前重新报价

In order to achieve the lowest possible rejection rate, the alternative stake feature has been enhanced and incorporated into the bet re-offer for pre-match betting. Just as in the case of alternative stake, if liability limits are breached, the alternative stake value is sent to the customer together with the rejection response, but the liability is reserved for a certain time frame arranged with the bookmaker (basically the time for the end customer to decide whether to accept the re-offer or not).
为了降低订单拒绝率，替代注额功能加入了赛前重新报价以改善这一点。如果到达责任上限，替代注额将和拒绝信息一起发送给客户，但是责任额度保留在与博彩公司安排的特定时间范围内（基本上是最终客户决定是否接受重新报价的时间）。

Note: MTS can have either alternative stake functionality enabled for live and pre-match bets or bet re-offer enabled for pre-match, or a combination of alternative stake for live and re-offer for pre-match bets. For further details please contact MTS OAM team.
注意：MTS 既可以为实时和赛前投注启用替代注额功能，也可以为赛前启用注额重新报价，也可以为赛前下注启用实时注额和重新报价的替代注额组合。 多详细信息，请联系 MTS OAM 团队。

If the end customer accepts the re-offer, the bet is guaranteed to be accepted as the liability for the bet was reserved, in case the status of selections in the bet is not changed. Hence, a higher number of bets will be accepted, and the end customer will not be disappointed by a second rejection.
如果最终客户接受重新报价，则在不改变赌注选择状态的情况下，保证保留该赌注，因为该赌注的责任已保留。 因此，高额的投注将被接受，并且客户不会被第二次拒绝而感到失望。

Bet re-offer works in the following cases:
投注重新报价在以下情况下有效：
  - Bet re-offer is triggered for the following rejection codes: -308, -511, -512, -701, -702, -703
    针对以下拒绝代码触发下注重新提供：-308，-511，-512，-701，-702，-703
  - Only pre-match bets (not for the live bets)
    仅赛前下注（不适用于实时下注）
  - Bet types: Singles, Multiples (accumulators)
    投注类型：單项，多项（过关）
  - For the time being, MTS is not offering bet re-offer for the tickets which contain several bets
    目前，MTS 不提供对包含多个投注的订单重新报价

Note: Bet re-offer is available only for pre-match betting. It is not available for live betting.
注意：重新报价仅适用于赛前下注。 它不适用于滚球投注。
Note: By default, the bet re-offer functionality is disabled on MTS side. If you would like it to be activated, please contact the MTS OAM team (or MTS CI team during the integration).
注意：默认情况下，MTS 端关闭重新投注功能。 如果您希望激活它，请与 MTS OAM 团队（或集成期间的 MTS CI 团队）联系。
Note: MTS also offers the possibility of using the combination of alternative stake for live bets and Bet re-offer for pre-match bets.
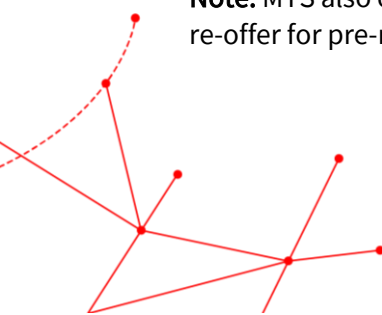
注意：MTS 还提供了滚球中替代注额和赛前重新报价的组合。

6.4. Alternative Odds (Previously Referred to as – "Odds Change Auto Acceptance") 替代赔率（以前称为–"自动接受赔率变化"）

For sportsbetting platforms which allow the end customer to confirm their consent to accept odds changes occurring during the bet placement process, MTS offers the possibility to accept incoming ticket requests regardless of an odds change. There are three possible options which MTS supports:
对于允许客户确认接受下注过程中发生的赔率变化的体育博彩平台，MTS 可以接受传入的注单请求，无论赔率怎样变化。 MTS 支持三种可能的选项：

- **none** – no odds change accepted (default)
  无-不接受赔率更改（默认）
- **any** – any odds change accepted
  任何–接受任何赔率变化
- **higher** – accept only higher odds in comparison to odds in the initial bet sent to MTS
  更高–只接受比发送给 MTS 的初始赔率更高的价格

Note: This functionality is available only for UOF clients. By default, it is disabled on MTS side. To enable it, MTS Client needs to contact MTS Operational Account Manager (OAM).
注意：此功能仅适用于 UOF 客户。 默认情况下，它在 MTS 端处于关闭状态。 要启用它，MTS 客户需要联系 MTS 运营客户经理（OAM）。

6.5. Ticket Cancellation 注单取消

Within the betting industry it is sometimes necessary for a bookmaker/punter to cancel an entire bet or a portion of it. This can happen due to various scenarios, but in all cases, MTS will need to receive a cancellation request so that records between the bookmaker and MTS are aligned. Within MTS we have a pre-defined list of acceptable reasons for bet cancellations that are supported.
在博彩业中，有时庄家/赌客需要取消全部或部分投注。 这可能由于各种情况而发生，但是在所有情况下，MTS 都需要接收到取消请求，从而使庄家与 MTS 之间的记录对齐。 在 MTS 中，我们有一个预先定义的可接受的取消投注原因列表。

During integration, the OAM team will identify the required cancellation types and activate them for the client (including setting various configuration options). For any cancellation scenarios not listed, please also contact OAM, as these may be added but may require agreement between Sportradar and the client.
在集成期间，OAM 团队将确定所需的取消类型并为客户激活它们（包括设置各种配置选项）。 对于未列出的任何取消方案，也请联系 OAM，因为可能会添加这些方案，但可能需要 Sportradar 与客户之间达成协议。

Each supported cancellation has a specific code and a corresponding reason message (please see the table below)
每种可取消得情况都有一个特定的代码和相应的原因（请参阅下表）。.

Table 6-1 Cancellation Options

Reason Code 代码	Reason Message 原因

101	Customer triggered Pre-match bet cancellation 客户触发赛前投注取消	
102	Time Out triggered bet cancellation (partial cancellation is not available) 超时触发了投注取消（部分取消不可用）	
103	Bookmaker's Backoffice triggered bet cancellation 博彩公司的后台触发了取消投注	
104	Bookmaker's Technical issue triggered bet cancellation 博彩公司的技术问题触发取消投注	
105	Exceptional bookmaker triggered bet cancellation 因特别情况导致博彩公司触发了投注取消	
301	Bet cancellation triggered by SOGEI (applicable for Italian jurisdictions) SOGEI 触发的取消投注（适用于意大利司法管辖区）	
302	Bet cancellation triggered by SCCS (applicable for Belorussian jurisdictions) SCCS 触发的取消投注（适用于白俄罗斯辖区）	

Customer triggered Pre-match bet cancellation (cancellation code 101)
客户触发的赛前投注取消（取消代码 101）

Should be used to request a bet cancellation when a punter has cancelled a Pre-Match bet (fully or partially).
当下注者（全部或部分）取消赛前投注时，应用于请求取消投注。

Time Out triggered bet cancellation (cancellation code 102)
超时触发的投注取消（取消代码 102）

Should be used to request a bet cancellation if a ticket response was not received by the client from the MTS service within a specific amount of time (suggest time period = 16 seconds). Code 102 is not available for partial cancellations.
如果客户端在特定时间段内（建议时间段=16 秒）未从 MTS 服务接收到票务响应，则应用于请求取消投注。 代码 102 不适用于部分取消。

Bookmaker's Back office triggered bet cancellation (cancellation code 103)
庄家的后台触发了取消投注（取消代码 103）

Should be used if a ticket was sent with incorrect information (i.e. manual error – wrong selection / odds / stake / account number etc) and the bet needs to be cancelled (fully or partially) and then re-sent with correct information.
如果发送的订单中包含错误的信息（即人为错误–错误的选择/赔率/赌注/帐号等），并且需要取消（全部或部分）下注，然后使用正确的信息重新发送，则应使用此选项。

Bookmaker's Technical issue triggered bet cancellation (cancellation code 104)
### 庄家的技术问题触发了取消投注（取消代码 104）

Should be used if a client encounters technical difficulties on their side and needs to cancel bets after the technical issue has been resolved. Code 104 is not available for partial cancellations.
如果客户一方遇到技术困难并在技术问题解决后需要取消投注，则应使用此选项。 代码 104 不适用于部分取消。

Exceptional circumstances bookmaker triggered bet cancellation (cancellation code 105)
特殊情况下，庄家触发了取消投注（取消代码 105）

There can be other unforeseen occasions where cancellations (full or partial) may need to be requested (other than the above-mentioned cancellations). In these instances, this cancellation code
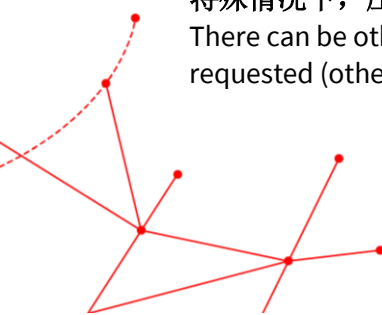
should be used.
在其他无法预料的情况下，可能需要请求取消（全部或部分取消）（上述取消除外）。 在这些情况下，应使用这些取消代码。

Bet cancellation triggered by SOGEI (cancellation code 301)
SOGEI 触发的取消投注（取消代码 301）
Should be used to inform MTS of cancellations triggered by SOGEI.

应用于通知 MTS 因 SOGEI 触发的取消。

Bet cancellation triggered by SCCS (cancellation code 302)
SCCS 触发的取消投注（取消代码 302）
Should be used to inform MTS of cancellations triggered by SCCS.
应用于通知 MTS 因 SCCS 触发的取消。

6.5.1. Partial Cancellation 部分取消

With partial cancellation feature, available since June 2019, it is possible to cancel:
自 2019 年 6 月起提供部分取消功能：
  − an entire ticket,
    整张注单·,
  − a portion of a ticket,
    注单的一部分
  − an entire bet of a multi-bet ticket,
    多注彩票的整个投注，
  − a subset of bets of a multi-bet ticket,
    多注彩票的下注子集
  − a portion of a bet of a multi-bet ticket,
    多注彩票的赌注的一部分
 − custom portions of different bets of a multi-bet ticket.
    多注彩票的不同投注的自定义部分

Bookmakers can send as many partial Cancellation requests as they want, provided that the Cancellation ratio of each Cancellation request includes all previous Cancellation requests' values. MTS does not aggregate Cancellation ratio values of individual requests and considers the last request as the final one.
庄家可以根据需要发送任意数量的部分订单取消请求，但前提是每个取消请求的取消率均应包含所有先前取消请求的值。 MTS 不会汇总单个请求的取消比率值，而是将最后一个请求视为最终请求。

6.6. Cashout 套现

The Cashout feature allows operators to offer end customers an opportunity to lock in a profit before a bet result is actually known. Basically, Cashout is where an operator can offer the end customer a payout for a bet before the outcome of the bet is known. The actual Cashout value must be calculated by the client, but Sportradar does offer the UOF probability service to help client calculate such Cashout values.
兑现功能使运营商可以为最终客户提供在实际知道投注结果之前锁定利润的机会。 基本上，套现
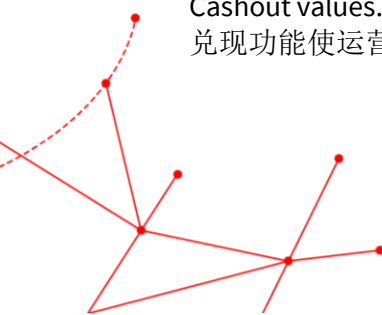
是运营商可以在得知赌注结果之前向最终客户提供的支付方式。 实际兑现值必须由客户计算，但是 Sportradar 提供 UOF 概率服务来帮助客户计算此类兑现值。

Note: Since June 2019, MTS is able to handle multiple partial Cashout requests.
注意：自 2019 年 6 月起，MTS 可以处理多个部分提款请求。

In order to offer Cashout to MTS Clients, Sportradar currently offers two services:
Sportradar 当前为 MTS 提供两种套现服务：

1. UOF Probability. The UOF Probability service is a part of the Unified Odds Feed and provides probabilities for live selections that are not closed/settled. UOF contains the current probabilities, however, there will be instances where lines (SOV's) have changed, and in these cases Sportradar does not send any probabilities in the feed for the original Special Odds Value (SOV) as it has been changed. In such cases, Sportradar clients can use the UOF Probability service to retrieve probabilities.
UOF 概率。 UOF 概率服务是统一赔率馈送的一部分，它为未关闭/结算的实时选择提供概率。 UOF 包含当前概率，但是，在某些情况下，当特别赔率值（SOV）发生了变化，在这种情况下，Sportradar 不会在 Feed 中针对原始特殊赔率（SOV）发送任何概率，因为它已经发生了变化。 在这种情况下，Sportradar 客户可以使用 UOF 概率服务来检索概率。

   More information can be found in the UOF documentation, chapter **Probabilities and Cashout endpoints**.
   可以在 UOF 文档的"概率和套现端点"一章中找到更多信息。

2. MTS Cashout protocol, which allows the Operator to inform MTS about already processed Cashouts for Pre-Match and Live tickets - singles, multiples (accumulator) and system bets.
MTS 套现协议，该协议使运营商可以将有关赛前和即场彩票的已处理兑现的通知 MTS-单注，多注，和系统投注。

Clients can choose to use the UOF probability service to help calculate Cashout values or calculate them themselves, but either way they need to use the MTS Cashout Protocol to inform MTS of all Cashouts. MTS does not provide risk management for the Cashouts. The Operator is simply informing MTS about already cashed out bets. In this case, liabilities will be recalculated according to the received information of the Cashouts. The receipt of Cashout information does not have an immediate effect on invoicing for the MTS services between Sportradar and the Operator.
客户可以选择使用 UOF 概率服务来帮助计算兑现值，也可以自己计算，但无论哪种方式，他们都需要使用 MTS 兑现协议将所有兑现通知 MTS。 MTS 不提供兑现的风险管理。 运营商只是将已经兑现的赌注告知 MTS。 在这种情况下，将根据收到的现金支出信息重新计算负债。 兑现信息的接收不会立即影响 Sportradar 与运营商之间 MTS 服务的发票。

Note: MTS cannot be used to validate and verify Cashout amount before offering it to the end customer.
注意：在发送给最终客户前，MTS 不能用于验证兑现金额。

Note: By default, the Cashout functionality is disabled on the MTS side. If your platform supports Cashout and you need the Cashout receipt activated in MTS, please contact the MTS OAM team.
注意：默认情况下，MTS 端的 Cashout 功能处于禁用状态。 如果您的平台支持兑现，并且您需要在 MTS 中激活兑现收据，请联系 MTS OAM 团队。
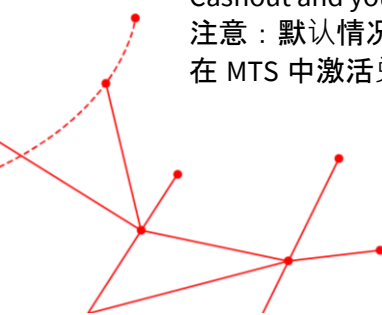
6.6.1. Cashout Flow 兑现流程

From a procedural perspective, the Cashout flow is slightly different to the bet cancellation flow. Before accepting the ticket cancellation, the Operator will send the appropriate ticket cancellation request to MTS. Only if the ticket cancellation request is accepted by MTS, the Operator can finalize the bet cancellation transaction.
从程序的角度来看，兑现流程与投注取消流程略有不同。 在接受注单取消之前，运营商将适当的注单取消请求发送给 MTS。 只有在 MTS 接受了取消票请求之后，运营商才能最终完成取消投注交易。
In case of a Cashout, the Operator sends the appropriate message to MTS after the Cashout offer is accepted by the punter and paid out (post-factum).
如果有兑现发生，操作者在接受兑现并付清之后（事后），将适当的消息发送给 MTS。

1. Operator offers Cashout to end customer
   运营商向最终客户提供兑现
   a. Betradar offers probabilities for events which are available for Live betting (check chapter **Probabilities and cashout endpoints** in UOF documentation)
      Betradar 提供可用于即时投注的事件的概率（请参阅 UOF 文档中的概率和兑现端点一章）
2. End Customer accepts Cashout offer
   最终客户接受兑现
3. Operator finalizes Cashout and sends appropriate request to MTS
   运营商完成兑现并向 MTS 发送适当的请求
4. If MTS accepts the ticket Cashout request, the flow is then complete
   如果 MTS 接受注单兑现请求，则流程完成
5. If MTS declines the ticket Cashout request, the Operator will need to contact the OAM in this instance.
   如果 MTS 拒绝了注单兑现请求，则在这种情况下，运营商将需要与 OAM 联系。

6.7. Non-Sportradar Content 非 Sportradar 内容

With the Non-Sportradar content feature we added the support for consuming and accepting bets which include Non-Sportradar content (other feed providers). This gives customers, with multiple feed providers the possibility to send selections from their different contents within one bet. MTS provides risk management only for Sportradar content.
对于非 Sportradar 提供的内容，我们支持接受非 Sportradar 内容（其他数据源提供者）的投注。 这使对于接入多个数据源供应商的客户可以在一笔订单中发送其不同内容的选择。 MTS 仅对 Sportradar 内容提供风险管理。
In this case the punter (end customer) can combine selections from different contents on the same ticket.
在这种情况下，下注者（最终客户）可以在同一注单上组合来自不同内容的选择。
Different options of selections on ticket:
注单选择的不同选项：

– Pure Sportradar content selections (only Sportradar content selections appear in bet)
  纯 Sportradar 内容选择（仅 Sportradar 内容选择出现在赌注中）
– Mixed content selections (Sportradar and Non-Sportradar content selections appear in bet)
  混合内容选择（Sportradar 和非 Sportradar 内容选择出现在赌注中）
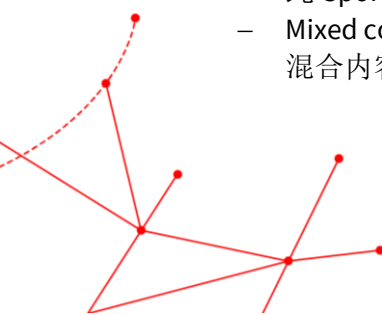
– Pure Non SR content selections (only Non-Sportradar content selections appear in bet)
纯非 SR 内容选择（只有非 Sportradar 型内容选择出现在投注中）

Note: Support of Non-Sportradar content is disabled by default. To enable it, operator needs to contact MTS Operational Account Manager (or MTS Client Integration Engineer during integration process).
注意：默认情况下，不支持非 Sportradar 内容。 要启用它，操作员需要联系 MTS 运营客户经理（或在集成过程中联系 MTS 客户集成工程师）。
Note: In case of mixed content bets, risk management will be provided only for Sportradar content.
注意：对于混合内容投注，仅针对 Sportradar 内容提供风险管理。
Note: System bets are not possible when Non-SR content selection is present.
注意：当存在非 SR 内容选择时，无法进行系统下注。
Cashout is possible only without any validations just that the maximum payout is not breached.
仅在没违反最大支付额的情况下，才能进行兑现，无需任何验证。

6.8. Custom Bet 自定义投注

Custom Bet is an extension for Unified Odds Feed customers and provides two additional connection endpoints. These endpoints provide information for creation of custom-tailored bets for a specific match. Custom Bet adds possibility to combine a wide range of betting markets into one single odds and probabilities calculation, in much the same way as an accumulator (a single wager made up of multiple selections).
自定义投注是 Unified Odds Feed 客户的扩展，并提供了两个附加的连接端点。 这些端点为创建针对特定比赛的定制赌注提供了信息。 自定义投注增加了将广泛的投注市场合并为一个单一的赔率和概率计算的可能性，这与累加器（由多个选项组成的单个投注）几乎相同。

An example of a Custom Bet could include a combination of the following markets:
自定义投注的示例可以包括以下市场的组合：
– Liverpool to win the match
利物浦赢得比赛
– Liverpool to score most goals in the first half
利物浦上半场进球最多
– Liverpool to score most goals in the second half
利物浦下半场进球最多
– Liverpool to win corner 1x2
利物浦赢得角球 1x2
– Total over 2.5
总进球超过 2.5

This means that it is possible to combine markets that would previously have been blocked due to related contingencies.
这意味着可以合并以前因相关性而被封锁的玩法。

Note: Custom Bet only exposes API endpoints, the front-end will need to be provided by the customer.
注意：自定义投注仅公开 API 端点，前端需要由客户提供。
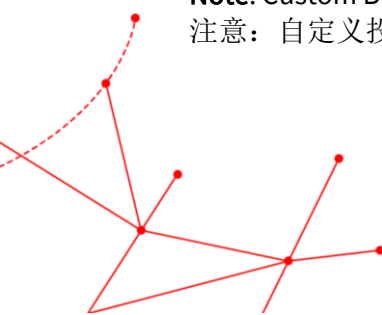
Note: Custom Bet is currently only available for Soccer matches, and for pre-match only.
注意：自定义投注目前仅适用于足球赛前投注比赛。

Note: This functionality is available only for UOF clients with an active "Custom Bet" package.
注意：此功能仅适用于具有已生效的"自定义投注"套餐的 UOF 客户。

The PDF version of the Custom Bet documentation is available here.
可在[此处](此处)获取"自定义投注"文档的 PDF 版本。
XSD files for Custom Bet can be found here.
自定义投注的 XSD 文件可在[此处](此处)找到
The market overview for Custom Bet and Unified Odds Feed can be found here.
您可以在[此处](此处)找到"自定义投注"和 UOF 市场的概述。

6.9. Initial Support for "Agent System" Bet Distribution 初始支持"代理系统"投注分配

MTS ticket version 2.3 introduces a new field as a rudimentary support for "agent system" bet distribution. The system is common among Asian bookmakers and is characterized by splitting the liability between various levels: Agent, Master Agent, Super Master Agent and the Bookmaker.
MTS 版本 2.3 引入了一个新选项，对"代理系统"赌注分配的基本支持。 该系统在亚洲博彩公司中很常见，其特点是将责任划分为各个级别：代理商，总代理商，超级总代理商和庄家。

MTS needs to manage the risk of the highest, Bookmaker level, as well as inform the users of the whole liability distributed between the different levels, even though unmanaged by the MTS.
MTS 需要管理最高庄家级别的风险，并通知用户各个级别之间分配的全部责任，即使不受 MTS 管理。

There is no difference in MTS ticket validation flow – "stake" object is still used to inform MTS of the bookmaker's part of the liability and the rest of the flow remains the same. For the time being, "bets[i].entireStake" will only be used for reporting purposes.
与 MTS 注单验证流程没有区别–"注额"对象仍用于告知 MTS 庄家应承担的责任，其余流程保持不变。 目前，" bets [i] .entireStake"仅用于报告目的。
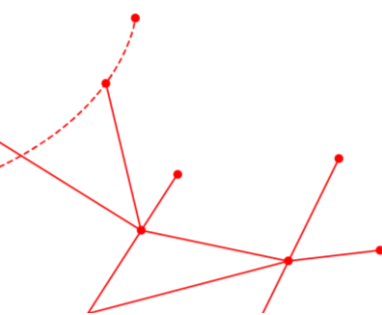
7. Sportsbetting Bonus 体育博彩奖金

For operators offering a sportsbetting bonus to their end customers (end customer receiving a % uplift on the winning amount depending on the number of selections in an accumulator bet) this bonus information should be included in the ticket sent to the MTS-system as additional information in the ticket data.
对于向其最终客户提供体育博彩奖金的运营商（最终客户根据累积投注的次数而获得中奖金额的％提升），此奖金信息应作为附加信息包含在发送给 MTS 系统数据中。

If such a bonus is offered, the bonus winning amount must be included in the field „bets[i].bonus.value". „bets[i].bonus.value" and have the same field type and dimension as the field „bets[i].stake.value".
如果提供了这种奖金，则奖金，中奖金额必须包含在" bets [i] .bonus.value"字段中。" bets [i] .bonus.value"，具有与字段" bets [i] .stake.value"相同的字段类型和维度。

The bonus value information does not directly affect liability and risk validation parameters but is used by the MTS Trading Department and the MTS system in the continuous ticket monitoring to detect betting pattern variations which could be driven by bonus playing motivation by punters.
奖金价值信息不会直接影响责任和风险确认参数，而是用于 MTS 操盘部门和 MTS 系统持续监控，以监测可能因奖金动机驱动的投注模式变化。

Note: MTS support only this type of bonus. Free bets or bets based on promotion credits are considered as bets based on real money as they are creating same level of risks as bets on real money.
注意：MTS 仅支持此类奖励。 免费投注或基于促销信用的投注被认为是基于真实货币的投注，因为它们产生的风险与真实货币相同。
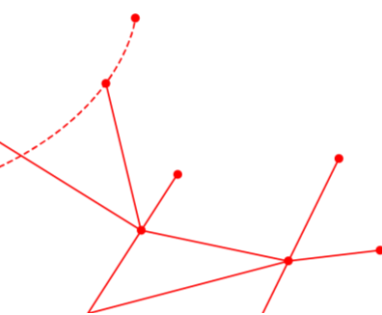
8. Exchange Rates 汇率

The system currency of the MTS-service is Euro.
MTS 服务的系统货币为欧元。

The MTS service uses the **OpenExchange** service (https://openexchangerates.org) as the exchange rate source to convert ticket values in non-EUR currencies to EUR. Rates are updated every full hour.
MTS 服务使用 OpenExchange 服务（https://openexchangerates.org）作为汇率来源，可以将非欧元货币的票据价值转换为欧元。 价格每隔一小时更新一次。

Rates are applied in the following way:
汇率以以下方式应用：

- Rates are applied using 6 decimals after comma.
  汇率使用小数后 6 位

- On ticket level the rate at bet acceptance time is applied for stake calculation in EUR.
  在注单级别，将采用投注接受时间的汇率来计算欧元。

- Winnings values are calculated based on the converted EUR values for stakes at bet acceptance time.
  彩金值是根据赌注接受时转换后的彩金欧元值计算得出的。