

Moscow International School of Physics

20–27 February, 2019

3rd bulletin

School Site and Date

The Moscow International School of Physics will be held from 20 till 27 February 2019 at the Higher School of Economics (HSE) Study Center “Voronovo” ~70 km to the south from Moscow.

GPS coordinates: 55°18'54.13"N (55.315035), 37°7'25.77"E (37.123825).

Scientific Programme

Scientific programme comprises a set of lectures, young scientists forum and a poster session. A schedule is shown in the table.

Time	20.02	21.02	22.02	23.02	24.02	25.02	26.02	27.02
8:00-9:00	Arrival	Breakfast						
9:00-10:00		Lectures			E x c u r s i o n	Lectures		
10:00-11:00		Lectures				Lectures		
11:00-13:30		Registra tion	Ski & outdoor			Ski & outdoor		Departure
13:30-14:30	Lunch			Lunch				
15:00-16:00	Lectures			Lectures				
16:00-16:30	Coffee			Coffee				
16:30-17:30	Lectures			Lectures				
17:30-18:30	Lecture	YSF	Lectures		YSF			
19:00-20:00	Dinner			Bonfire	Dinner			
20:00-...		Concert	Poster session		YSF			

Table: School schedule

List of lectures

- A. Belavin (Landau Institute, Chernogolovka) “Modern Trends in Theoretical Physics for Pedestrians”
- D. Kazakov (JINR, Dubna) “Standard Model and beyond”
- V. Rubakov (INR, Moscow) “Cosmology and Particle Physics”
- V. Vagnoni (INFN, Bologna & CERN, Geneva) “Flavor Physics”

- C. Giunti (INFN, Torino) “Neutrino Physics”
- J. Haba (KEK, Tsukuba) “Experimental Techniques in Particle Physics”
- A. De Roeck (CERN, Geneva) “LHC Results and Prospects”
- F. Ratnikov (HSE, Moscow) “Introduction to Machine Learning”

Young Scientists Forum

Special sessions will be devoted to the presentations of participants’ scientific results. The report should be in the form of a brief talk (10+2 minutes).

Poster session

Participants’ scientific results could be presented as a poster (portrait A1 or landscape A0) at the dedicated poster session. During the session presenting participant is required to be nearby.

Publication of the results

The most interesting talks will be published in the peer-reviewed journal “Bulletin of the Lebedev Physics Institute” indexed by the Web of Science platform. Authors of the posters, the most voted for by the School participants, will receive special prizes.

Social Program

Midday hours before lunch are dedicated to sports and other kinds of activity.

Cross-country ski rent is available for free.

The School social program also includes a concert and an excursion and the bonfire.

Transportation to Moscow

HSE Study Center “Voronovo” is situated in a remote place, about 70 km to the south from Moscow.

There are 3 airports in Moscow well connected to the center of Moscow by Aeroexpress trains. It is a cheap, easy and comfortable way to get to Moscow. The trains run to one of railway station in the city center. Travel time is about 35 minutes (47 minutes from Vnukovo airport). The interval between trains is 30 minutes (1 hour from Vnukovo airport). Tickets cost 500 rubles (~€ 7) and can be purchased at ticket windows, ticket machines or at turnstiles. If you buy a ticket at the company’s website (printed or saved at smartphone ticket with QR code is required) or with the mobile app, the cost is 450 rubles (~€ 6). The working hours are from 6 AM till midnight.

Tips and tricks

- You can pay using your credit card both for Aeroexpress and metro tickets, however at **least small amount of Russian rubles in cash is desirable**.
- Taxi and bus will require **to pay in cash** in Russian rubles.
- Foreign currency exchange offices at the airport have **extortionate exchange rates** compared to the offices in the city. It is better to get cash from ATMs (however you have to pay a commission, charged by your bank).
- We strongly recommend **not to use** the services of non-official taxi carriers. There are lots of drivers offering their services, please do realize that taking them you will pay much more than expected.
- There are convenient online taxi-services Yandex and Gett (available also at special desks at airports). Please beware that usually **taxi drivers do not speak English**. The taxi fare cost from the airports to the center of Moscow should not exceed 1500 rubles.

Transportation in Moscow

The Metro is the easiest and the most reliable way get around Moscow. Its layout is quite simple. Radial lines, which cut across the city in most directions, are joined together by a circular line, which also joins together the city's largest railway stations. Transport system also includes monorail and Moscow Central Circle (MCC). Each radial line has its own name, number and color on the metro map, and you can get from practically any station to another one with a maximum of three transfers.

To pay for your ride, buy a smart-card ("Ediniy" or "Troika") from a cashier or ticket vending machines in the metro (MCC) station vestibule.

Recline the smart-card to a yellow circle on the automatic gates, when green light is on or displays the number of remaining trips – pass through the gate. No matter how long you ride is or how many transfers you make, you pay no extra fee.

To help you find your way, there are several multicoloured metro maps in every car, and a loud speaker that announces the name of the station at every stop. The doors open and close automatically. There is a first-aid station and police post at every station. For information you can turn to any metro employee – they wear blue uniforms and red hats.

Mobile communication (GSM) works at stations of the Moscow underground. Free Wi-Fi ("MT_Free") available in all trains.

The Metro starts work at 06:00 AM, but stations open at 05:30–05:40 AM. At 01:00 AM the entrances close and passengers must complete their transfers. Last train leaves also at 01:03 AM.

Moscow Central Circle (MCC, Line 14) works from 05:45 AM to 00:30 AM every day. Transfer from metro to MCC (and back) is free for 90 minutes from the first enter.



The Moscow Metro

Fares information (since January 2nd, 2019) could be found at metro site (<http://mosmetro.ru>).

Safety Tips

Moscow historically enjoyed a low crime rate. However, Moscow is a booming metropolis, so common sense should be used. Avoid dark alleys – like you would anywhere else.

While traveling in Moscow, as in the rest of Russia, you must always have your passport with you (but in the safe pocket!). If you look as foreigner or nonresident, your papers may get checked more often than usual.

Most policemen do not speak English, but they will let you know if your papers are not in order and you must go with them to the police precinct. In any case, if you are a decent looking person odds to be asked to show documents are minuscule.

Also note that in winter months, streets in Moscow can get very slippery. Take a pair of grippy shoes or, even better, boots (to prevent twisted ankles) and a waterproof raincoat. Take care as ice patches are often hard to spot, even when they appear to have been cleared or melted. Wearing non-grippy shoes could result in injury.

Downtown Moscow is very brightly lit, and a lot of the wide roads have underground pedestrian walkways. Those are well lit too – so you should not worry about going down inside them. But of course keep an eye out for pickpockets (especially around the Kremlin, where the concentration of tourist is higher).

Do not ever pick up any wallets or other valuables, that do not belong to you in the street. It is almost always a scam.

Use the pedestrian crossings to cross the street, as traffic can get pretty crazy sometimes.



Map: The gathering point

Transportation to the School site

HSE Study Center “Voronovo” is situated in a quite remote place. The transportation by the public transport is complicated and time-consuming. Therefore Organizing Committee provides free transfer from Moscow to the School site and back at first and last day of the School, respectively. The buses will depart at 10:30 and 11:00 MSK from the Moscow Metro station “Tyoply Stan” (Тёплый стан) at the line 6. Please do not be late. The gathering point is shown at the map, GPS coordinates 37.505261E, 55.619982N. Riding by metro line number 6 (orange at map) from the city center, take the last car. At the platform turn to the left. After the turnstiles turn to the left and proceed to the exits (stairs) 8 or 9.

It is highly advised to have a charged cell phone with you to contact the organizers if you have lost.

Accommodation

The majority of the School events will be held at the HSE Study Center “Voronovo”. The Center is situated in scenic surroundings on the edge of an old forest and boasts spacious premises that are fully equipped for both educational and extracurricular events, and also for leisure activities ranging from sports to intellectual games.

The Study Center comprises of two connected but separate buildings — main and public. The main building offers hotel-style accommodation consisting of fully equipped standard rooms and suites, that have bathrooms, TV sets, and fridges. During the School participants will live in double rooms. Wi-Fi is available in the main building.

Please do not forget your passport. Without passport check-in is impossible.

Climate

Moscow region climate is typically continental. Weather in the second half of February fits well for various winter sports. It is usually sunny. The average temperature is about -5 degrees Celsius though sudden drops of temperature could be expected, as well as thaws, so having proper warm and waterproof clothes is advised. This winter the depth of the snow in February is estimated to be above 50 cm.

Currency and credit cards

Money exchange (preferably Euro or US dollars) is possible in various exchange offices in Moscow. There are also many ATMs (“Bankomat”) in Moscow which accept major credit cards. We recommend to have some cash since credit cards are not accepted in small shops.

HSE Study Center “Voronovo” is situated in remote place. There are no money exchange offices in the vicinity.

Emergency Phones

Please have these phone numbers with you. If you get lost or encounter any other troubles, please do not hesitate to call us.

+7(910)412-79-94 (Irina Chernysheva)

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Contacts

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