

Flavour in the era of the LHC, 4th meeting

Report of Contributions

Contribution ID: 0

Type: **not specified**

The history of the neutron EDM

Monday 9 October 2006 09:15 (45 minutes)

Before 1950 all theorists believed P (parity symmetry) and that there consequently could be no EDM for any elementary particle. Ramsey and Purcell [PR 78, 807 (1950)] pointed out that there was no experimental evidence for P in the case of nuclear forces so it should be tested. They proposed a search for a neutron EDM or d_n , as a test of P. The 1953 neutron beam experiment at Oak Ridge showed $d_n < 5 \times 10^{-20}$ e-cm. In 1956 Lee and Yang suggest P failure in weak force, which was confirmed next year by Wu and Ambler. Many theorists argued that, despite this P failure, there should still be no EDM because of T (time reversal symmetry). In 1957 Ramsey and J.D. Jackson pointed out that there was no experimental evidence for T in nuclear forces so neutron EDM tests were continued. In 1964 Oak Ridge Beam experiment $d_n < 10^{-21}$ e-cm.

In 1964 Fitch et al discovered failure of CP in K^0_L so T would fail if CPT conserved. Theorists reverse their view and became very interested in our experiments and are puzzled by our very low EDM limits. Other labs begin EDM experiments on neutron and atoms. In 1967 Oak Ridge Beam Experiments $d_n < 4 \times 10^{-23}$ e-cm, and in 1973 Grenoble Beam $d_n < 4 \times 10^{-24}$ e-cm. In 1984 experiments with ultra cold neutrons stored in bottles by independent Russian group in St. Petersburg and by group in Grenoble $d_n < 3 \times 10^{-25}$ e-cm. In 1999 St. Petersburg group and Grenoble group independently $d_n < 6.3 \times 10^{-26}$ e-cm. In 2006 Grenoble group with geometric phase correction find $d_n < 3.0 \times 10^{-26}$ e-cm. Experimental results compared with theoretical predictions.

Presenter: RAMSEY, Norman (Harvard)**Session Classification:** EDM and g-2 miniworkshop (VRVS: Virtual Room ROCK)

Contribution ID: 1

Type: **not specified**

Welcome/review of the Report plans for EDM/g-2

Monday 9 October 2006 09:00 (15 minutes)

Presenter: Dr SEMERTZIDIS, Yannis (BNL)

Session Classification: EDM and g-2 miniworkshop (VRVS: Virtual Room ROCK)

Contribution ID: 2

Type: **not specified**

Electric Dipole Moments as probes of new physics

Monday 9 October 2006 10:05 (50 minutes)

A review of the effective theory treatment of CP-odd operators contributing to EDMs, and the ensuing sensitivity to new CP-violating physics. As examples, new dimension-five operators in the MSSM, and a new Higgs-sector threshold allowing for electroweak baryogenesis, will be discussed.

Presenter: RITZ, Adam (Victoria/Canada)

Session Classification: EDM and g-2 miniworkshop (VRVS: Virtual Room ROCK)

Contribution ID: 3

Type: not specified

Review of the neutron EDMs (ILL and SNS)

Monday 9 October 2006 11:15 (50 minutes)

This talk will review three neutron EDM experiments: First, the room-temperature experiment at ILL, the results of which have just been published; second, the CryoEDM experiment at ILL that is now nearing the completion of its construction, and which promises an improvement in sensitivity of two orders of magnitude; and third, for the longer term, the cryogenic experiment that is planned to be built at the SNS in Oak Ridge, which is anticipated to have a sensitivity of below $1\text{E-}28$ e.cm.

Presenter: HARRIS, P. (Sussex)

Session Classification: EDM and g-2 miniworkshop (VRVS: Virtual Room ROCK)

Contribution ID: 4

Type: **not specified**

The neutron experiment at PSI plus the muon EDM prospects

Monday 9 October 2006 12:10 (40 minutes)

Status and plans for the neutron EDM experiment at PSI are updated. The idea for a compact muon EDM experiment with a sensitivity of 5×10^{-23} e-cm will be briefly discussed.

Presenter: KIRCH, K. (PSI)

Session Classification: EDM and g-2 miniworkshop (VRVS: Virtual Room ROCK)

Contribution ID: 5

Type: **not specified**

How to measure $g-2$ with 15 GeV muons

Monday 9 October 2006 14:00 (30 minutes)

Dilating the muon lifetime to 300 microsec can lead to ten times better accuracy. This can be achieved with a new design of storage ring using discrete magnets and calibrating the field by means of polarised protons in flight.

Presenter: FARLEY, F. (Yale)

Session Classification: EDM and $g-2$ miniworkshop (VRVS: Virtual Room ROCK)

Contribution ID: 6

Type: **not specified**

The deuteron EDM experiment

Monday 9 October 2006 14:35 (45 minutes)

A theoretical motivation for an EDM search on the deuteron will be presented, together with the so-called resonance method. The basic features of this method will be discussed in some detail.

Presenter: ONDERWATER, G. (KVI)

Session Classification: EDM and g-2 miniworkshop (VRVS: Virtual Room ROCK)

Contribution ID: 7

Type: **not specified**

Polarimetry for the dEDM method

Monday 9 October 2006 15:25 (25 minutes)

Presenter: VENANZONI, G. (Frascati)

Session Classification: EDM and g-2 miniworkshop (VRVS: Virtual Room ROCK)

Contribution ID: 8

Type: **not specified**

EDM of Proton and 3He

Monday 9 October 2006 16:10 (20 minutes)

Presenter: MORSE, W. (BNL)

Session Classification: EDM and g-2 miniworkshop (VRVS: Virtual Room ROCK)

Contribution ID: 9

Type: **not specified**

A plan of comprehensive investigation of systematic errors and spin coherence time for the deuteron resonance EDM experiment

Monday 9 October 2006 16:35 (45 minutes)

Presenter: ORLOV, Y. (Cornell)

Session Classification: EDM and g-2 miniworkshop (VRVS: Virtual Room ROCK)

Contribution ID: 10

Type: **not specified**

EDM searches on atoms with deformed nuclei: Ra-225

Monday 9 October 2006 17:45 (40 minutes)

Nuclei which are characterized by octupole deformation should have relatively large Schiff moments and therefore be particularly sensitive to T-violating interactions in the nucleus. Currently, the most stringent limits in this sector are set by measurements made at the University of Washington, which restrict the atomic EDM of Hg-199 to $<2.1 \times 10^{-28}$ e cm. We are developing an experiment around Ra-225, which is predicted to be two to three orders of magnitude more sensitive to T-violating interactions in the nucleus than Hg-199. The experimental scheme and our recent success in laser-trapping radium will be discussed along with other group's efforts to take advantage of this enhancement.

Presenter: GUEST, J.R. (Argonne)**Session Classification:** EDM and g-2 miniworkshop (VRVS: Virtual Room ROCK)

Contribution ID: 11

Type: **not specified**

(Cancelled, M. Kozlov covered some of the material) Overview of the electron EDM experiments

Tuesday 10 October 2006 09:00 (45 minutes)

The experiment responsible for the current limit on the electron's electric dipole moment is described. A very brief overview of the many current efforts to push this limit is presented. Efforts underway at the University of Oklahoma to exploit the unique magnetic properties of PbF are described with a particular emphasis on the development of new resonant enhanced multiphoton ionization schemes.

Presenter: SHAFER-RAY, N. (Oklahoma Univ.)

Session Classification: EDM and g-2 miniworkshop (VRVS: Virtual Room ROCK)

Contribution ID: **12**

Type: **not specified**

Theory of molecular EDM experiments

Tuesday 10 October 2006 09:50 (20 minutes)

Presenter: KOZLOV, M. (St. Petersburg)

Session Classification: EDM and g-2 miniworkshop (VRVS: Virtual Room ROCK)

Contribution ID: **13**

Type: **not specified**

EDM experiments as probes of SUSY

Tuesday 10 October 2006 10:20 (25 minutes)

Presenter: MASINA, Isabella (Rome)

Session Classification: EDM and g-2 miniworkshop (VRVS: Virtual Room ROCK)

Contribution ID: 14

Type: **not specified**

Measuring the Muon Anomaly to 0.25 ppm

Tuesday 10 October 2006 11:00 (35 minutes)

A proposal has been approved at the BNL AGS to improve upon the muon magnetic anomaly measurement uncertainty by a factor of two, to 0.25 ppm. The current experimental value differs from the theoretical value by about 3 standard deviations. This suggests the possibility of new physics, and an increased data set could make the comparison between theory and experiment more definitive.

Presenter: MILLER, J. (Boston)**Session Classification:** EDM and g-2 miniworkshop (VRVS: Virtual Room ROCK)

Contribution ID: 15

Type: **not specified**

Evaluation of the hadronic vacuum polarization contribution to the muon $g-2$

Tuesday 10 October 2006 11:40 (30 minutes)

The contribution from hadronic vacuum polarization to the muon anomalous magnetic moment is calculated with a dispersion relation using experimental data and perturbative QCD as input. Its uncertainty is presently limiting the Standard Model prediction, and is of the same order as the experimental error on $g-2$. The state of the art of the calculation is discussed and perspectives for future improvement are given.

Presenter: HOECKER, Andreas (CERN)

Session Classification: EDM and $g-2$ miniworkshop (VRVS: Virtual Room ROCK)

Contribution ID: 16

Type: **not specified**

Hadrons at VEPP-2M

Tuesday 10 October 2006 12:15 (20 minutes)

The Budker Institute (Novosibirsk, Russia) is mostly dedicated to physics in e^+e^- colliders at relatively low energy. The VEPP-2M collider operated in 1992-2000 at $s = 0.36$ to 1.4 GeV region and provided high luminosity for detectors CMD-2 and SND. High level of collected statistics as well as careful design, construction and operation of the detectors, and data processing allowed us to obtain numerous interesting physics results. From those, the most important one is measurement of hadron contribution to the anomalous magnetic moment of muon.

At the present moment, most of our efforts are put on development and construction of the next generation Budker Institute collider, VEPP-2000 (which will operate at $s = 0.4$ to 2.0 GeV) and the new detector CMD-3. The second detector, SND, will be upgraded.

We plan to obtain first luminosity in the VEPP-2000 ring by the end of this year (2006), and start first physics runs in 2007.

Presenter: REDIN, S. (Novosibirsk)

Session Classification: EDM and g-2 miniworkshop (VRVS: Virtual Room ROCK)

Contribution ID: 17

Type: **not specified**

e⁺e⁻ Hadronic Cross Section measurement at DAFNE with the KLOE detector

Tuesday 10 October 2006 12:40 (20 minutes)

At the Frascati phi-factory DAFNE the pion form factor is measured by means of the “radiative return”, i.e. by using events in which one of the collider electrons (positrons) has radiated an initial state radiation photon (ISR), lowering in such a way the invariant mass $M(\pi\pi)$ of the two-pion-system.

In a recent publication of the KLOE collaboration the initial state radiation photon had been required to be at small polar angles with respect to the beam axis, the so called “Small Angle analysis”, using data collected in 2001. We show an update of this analysis, using 2002 data. We also present results from a new and complementary analysis in which the photon is tagged at large polar angles. Only like this the threshold region $M^2(\pi\pi) < 0.35 \text{ GeV}^2$ becomes accessible.

Presenter: LEONE, Debora (Karlsruhe)

Session Classification: EDM and g-2 miniworkshop (VRVS: Virtual Room ROCK)

Contribution ID: 18

Type: **not specified**

Contributions of Magnetic Resonance to Other Sciences

Wednesday 11 October 2006 16:30 (1 hour)

One of the attractive features of fundamental research is the frequency with which new methods or discoveries in one narrow field of research eventually often make very important contributions to other fields. This has been conspicuously true of magnetic resonance, with which I have been associated ever since I.I. Rabi invented and demonstrated the method for the important but limited purpose of measuring nuclear magnetic moments. The following year we were surprised by the unexpected appearance of the H₂ magnetic resonance, which we soon showed was due to the magnetic effects of the other proton and the rotating charged molecule; from these measurements we could also obtain important chemical and molecular information. We had another shock when we studied D₂ and found the resonance curves were spread more widely for D₂ than H₂ even though the magnetic interactions should have been much smaller. We found we could explain this by assuming that the deuteron had an electric quadrupole moment and J. Schwinger pointed out that this would require the existence of a previously unsuspected electric tensor force between the neutron and the proton. With this, the resonance method was also giving new fundamental information about nuclear forces. In 1944, Rabi and I pointed out that it should be possible by the Dirac theory and our past resonance experiments to calculate exactly the hyperfine interaction between the electron and the proton in the hydrogen atom and we had two graduate students, Nafe and Nelson do the experiment and they found a disagreement which led J. Schwinger to develop the first successful relativistic quantum field theory and QED. In 1964, Purcell, Bloch and others detected magnetic resonance transitions by the effect of the transition on the oscillator, called NMR, making possible measurements on liquids, solids and gases and giving information on chemical shifts and thermal relaxation times T₁ and T₂. I developed a magnetic resonance method for setting a limit to the EDM of a neutron in a beam and with others for neutrons stored in a suitably coated bottle. Magnetic resonance

measurements provide high stability atomic clocks. Both the second and the meter are now defined in terms of atomic clocks. Lauterbuhr, Mansfield and Damadian and others developed the important methods of using inhomogeneous magnetic fields to localize the magnetic resonance in a tissue sample producing beautiful and valuable magnetic resonance images, MRI's, and fMRI's.

Presenter: RAMSEY, Norman (Harvard University)

Session Classification: Concluding plenary session (VRVS: Virtual Room EINSTEIN)

Contribution ID: **19**

Type: **not specified**

New Measurement of the Electron Magnetic Moment and the Fine Structure Constant

Tuesday 10 October 2006 16:30 (50 minutes)

Presenter: GABRIELSE, Gerald (Harvard)

Session Classification: EDM and g-2 miniworkshop (VRVS: Virtual Room ROCK)

Contribution ID: 20

Type: **not specified**

More on EDM correlations in SUSY

Tuesday 10 October 2006 17:20 (30 minutes)

Certain relations among EDMs can be viewed as indirect evidence for supersymmetry. I will report on recent work on EDM correlations which includes analyses of non-universal SUSY models.

Presenter: LEBEDEV, Oleg (Bonn)

Session Classification: EDM and g-2 miniworkshop (VRVS: Virtual Room ROCK)

Contribution ID: 21

Type: **not specified**

Spin and beam dynamics simulations

Monday 9 October 2006 17:30 (15 minutes)

Presenter: LUCCIO, A. (BNL)

Session Classification: EDM and g-2 miniworkshop (VRVS: Virtual Room ROCK)

Contribution ID: 22

Type: **not specified**

Prospects for a Muon to Electron Conversion Experiment at Fermilab

Wednesday 11 October 2006 09:00 (25 minutes)

It is proposed to measure the rate of coherent muon to electron conversion in the field of a nucleus, without neutrino production, to a precision of 10^{-16} times the rate of ordinary muon capture on the nucleus. This is an example of charged lepton flavor violation. The measurement would be several thousand times more sensitive than previous experiments. A working group has been formed to examine the feasibility of performing the experiment at Fermilab. The group met in mid-September, 2006, at Fermilab. I will describe briefly the status and prospects of this project and what transpired at the meeting.

Presenter: MILLER, Jim (Boston)**Session Classification:** WG3, Wednesday morning

Contribution ID: 23

Type: **not specified**

Search for $B \rightarrow \mu + e$ with LHCb

Wednesday 11 October 2006 09:30 (25 minutes)

We discuss the LHCb potential for the LFV $B \rightarrow e \mu$ decay and the possibility of constraining the leptoquark mass within the context of the Pati-Salam $SU(4)$ model.

Presenter: BONIVENTO, Walter (I.N.F.N. Cagliari, Italy)

Session Classification: WG3, Wednesday morning

Contribution ID: 24

Type: **not specified**

Leptogenesis and LFV in type I+II seesaw mechanism

Tuesday 10 October 2006 14:00 (25 minutes)

Presenter: LAVIGNAC, Stephane (SPhT Saclay)

Session Classification: WG3, Tuesday afternoon

Contribution ID: 25

Type: **not specified**

Lepton Flavor Violation, Leptogenesis and Neutrino Mixing in QLC scenarios

Tuesday 10 October 2006 14:30 (25 minutes)

Presenter: RODEJOHANN, Werner (TU Muenchen)

Session Classification: WG3, Tuesday afternoon

Contribution ID: 26

Type: **not specified**

Flavour violation in “minimal” SUSY SU(5) models

Tuesday 10 October 2006 15:00 (25 minutes)

We compare the patterns of the flavor violating effects which are radiatively induced via the neutrino Yukawa couplings in “minimal” SU(5) models with the Type I or Type II seesaw mechanism for the neutrino masses. We pay special attention to the ratio between the lepton flavor violations and the quark flavor violations, and especially to its dependence on the UV physics, such as the GUT parameters and cutoff scale.

Presenter: YAMASHITA, Toshifumi (S.I.S.S.A.)

Session Classification: WG3, Tuesday afternoon

Contribution ID: 27

Type: **not specified**

Unitarity in the leptonic sector

Tuesday 10 October 2006 15:30 (25 minutes)

We determine the leptonic mixing matrix elements without assuming unitarity. To do this, we firstly develop the formalism to study neutrino oscillations and then we perform the fits. We realize that oscillation experiments alone are not enough to constrain all the matrix elements. However, by combining them with other electroweak data, we can determine all of them.

Presenter: BIGGIO, Carla (Madrid)**Session Classification:** WG3, Tuesday afternoon

Contribution ID: 28

Type: **not specified**

CMS discovery potential for SUSY topologies

Monday 9 October 2006 14:05 (20 minutes)

Presenter: SPIROPULU, Maria

Session Classification: WG1, Monday afternoon

Contribution ID: 29

Type: **not specified**

Using the e⁺e⁻ → μ⁺μ⁻ + E_{Tmiss} signature in the search for supersymmetry and lepton flavour violation in neutralino decays

Monday 9 October 2006 14:30 (15 minutes)

Presenter: KRASNIKOV, Nikolai

Session Classification: WG1, Monday afternoon

Contribution ID: **30**

Type: **not specified**

Lepton flavour violation in neutralino decays

Tuesday 10 October 2006 09:30 (20 minutes)

Presenter: HINCHLIFFE, Ian

Session Classification: WG1, Tuesday morning

Contribution ID: 32

Type: **not specified**

The relevance of electroweak effects in the overall t-channel single top production at LHC

Tuesday 10 October 2006 10:30 (20 minutes)

Presenter: VERZEGNASSI, Claudio

Session Classification: WG1, Tuesday morning

Contribution ID: 33

Type: **not specified**

Contributions from dimension five and six effective operators to flavour changing top physics

Tuesday 10 October 2006 11:30 (20 minutes)

Presenter: MARTINS FERREIRA, Pedro Miguel

Session Classification: WG1, Tuesday morning

Contribution ID: 34

Type: **not specified**

Lepton number violation with muons at LHC

Tuesday 10 October 2006 14:00 (20 minutes)

Presenter: DEL AGUILA, Francisco

Session Classification: WG1, Tuesday afternoon

Contribution ID: 35

Type: **not specified**

Signals of new fermions at high transverse momenta

Tuesday 10 October 2006 14:30 (20 minutes)

Presenter: AGUILAR-SAAVEDRA, Juan Antonio

Session Classification: WG1, Tuesday afternoon

Contribution ID: 36

Type: **not specified**

Detection of heavy Majorana neutrinos and right-handed bosons

Tuesday 10 October 2006 15:00 (15 minutes)

Presenter: KIRSANOV, Mikhail

Session Classification: WG1, Tuesday afternoon

Contribution ID: 37

Type: **not specified**

E6 and the Higgs boson

Wednesday 11 October 2006 09:00 (20 minutes)

Presenter: UNEL, Gokhan

Session Classification: WG1, Wednesday morning

Contribution ID: **38**

Type: **not specified**

Multi-W events at the LHC

Wednesday 11 October 2006 09:30 (20 minutes)

Presenter: SERVANT, Geraldine

Session Classification: WG1, Wednesday morning

Contribution ID: **39**

Type: **not specified**

4th family physics

Wednesday 11 October 2006 10:00 (20 minutes)

Presenter: OZCAN, Erkan

Session Classification: WG1, Wednesday morning

Contribution ID: 40

Type: **not specified**

Determination of the D-d mixing angle

Wednesday 11 October 2006 10:30 (20 minutes)

Presenter: UNEL, Gokhan

Session Classification: WG1, Wednesday morning

Contribution ID: 41

Type: **not specified**

CMS discovery potential for Z'/ED and spin discrimination

Wednesday 11 October 2006 11:30 (20 minutes)

Presenter: CLERBAUX, Barbara

Session Classification: WG1, Wednesday morning

Contribution ID: 42

Type: **not specified**

News on SuperKEKB physics reach

Monday 9 October 2006 09:00 (20 minutes)

Presenter: HAZUMI, Masashi (KEK)

Session Classification: WG2, Monday morning (VRVS: Virtual Room EINSTEIN)

Contribution ID: 43

Type: **not specified**

linear super B update

Monday 9 October 2006 09:30 (20 minutes)

Presenter: FORTI, Francesco (Pisa)

Session Classification: WG2, Monday morning (VRVS: Virtual Room EINSTEIN)

Contribution ID: 44

Type: **not specified**

LHCb Upgrade

Monday 9 October 2006 10:00 (20 minutes)

Presenter: MUHEIM, Franz (Edinburgh)

Session Classification: WG2, Monday morning (VRVS: Virtual Room EINSTEIN)

Contribution ID: 45

Type: **not specified**

New physics signals using exclusive radiative B-decays

Monday 9 October 2006 10:30 (20 minutes)

Presenter: SONI, Amarjit (BNL)

Session Classification: WG2, Monday morning (VRVS: Virtual Room EINSTEIN)

Contribution ID: 46

Type: **not specified**

Discovery potential for Bs- $\rightarrow$ $\mu^+\mu^-$ in CMS

Monday 9 October 2006 12:00 (20 minutes)

Presenter: EGCEL, Christina (ETH Zurich)

Session Classification: WG2, Monday morning (VRVS: Virtual Room EINSTEIN)

Contribution ID: 47

Type: **not specified**

Search for the decay $B_s \rightarrow \mu^+ \mu^-$ at LHCb

Monday 9 October 2006 12:30 (20 minutes)

Presenter: TEUBERT, Frederic (CERN)

Session Classification: WG2, Monday morning (VRVS: Virtual Room EINSTEIN)

Contribution ID: 48

Type: **not specified**

B- $\rightarrow$ K * gamma TDCP asymmetry: (quasi) null test for SM

Monday 9 October 2006 11:30 (20 minutes)

Presenter: ZWICKY, Roman (Durham IPPP)

Session Classification: WG2, Monday morning (VRVS: Virtual Room EINSTEIN)

Contribution ID: 49

Type: **not specified**

B_{s,d} → KK using QCD Factorization and flavour symmetries

Monday 9 October 2006 14:00 (20 minutes)

Presenter: DESCOTES-GENON, Sebastien (LPT Orsay)

Session Classification: WG2, Monday afternoon (VRVS: Virtual Room EINSTEIN)

Contribution ID: 50

Type: **not specified**

Higher order QCD in exclusive B decays

Monday 9 October 2006 14:30 (20 minutes)

Presenter: BELL, Guido (LMU Munich)

Session Classification: WG2, Monday afternoon (VRVS: Virtual Room EINSTEIN)

Contribution ID: 51

Type: **not specified**

Update on charm results

Monday 9 October 2006 15:00 (20 minutes)

Presenter: ASNER, David (Carleton)

Session Classification: WG2, Monday afternoon (VRVS: Virtual Room EINSTEIN)

Contribution ID: 52

Type: **not specified**

Charm physics at LHCb

Monday 9 October 2006 15:30 (20 minutes)

Presenter: SPRADLIN, Patrick (Oxford)

Session Classification: WG2, Monday afternoon (VRVS: Virtual Room EINSTEIN)

Contribution ID: 53

Type: **not specified**

Convenors and study group contacts: Write-up matters

Monday 9 October 2006 16:30 (2 hours)

Session Classification: WG2, Monday afternoon (VRVS: Virtual Room EINSTEIN)

Contribution ID: 54

Type: **not specified**

B- $\rightarrow$ K^{*}ll and extra dimensions

Tuesday 10 October 2006 09:00 (20 minutes)

Presenter: DE FAZIO, Fulvia (INFN Bari)

Session Classification: WG2, Tuesday morning (VRVS: Virtual Room EINSTEIN)

Contribution ID: 55

Type: **not specified**

Charm resonances in $b \rightarrow sll$

Tuesday 10 October 2006 09:30 (20 minutes)

Presenter: KHODJAMIRIAN, Alexander (Siegen)

Session Classification: WG2, Tuesday morning (VRVS: Virtual Room EINSTEIN)

Contribution ID: 56

Type: **not specified**

B- $\rightarrow$ K^{*}ll at LHCb

Tuesday 10 October 2006 10:00 (20 minutes)

Presenter: Dr EGEDE, Ulrik (Imperial College London)

Session Classification: WG2, Tuesday morning (VRVS: Virtual Room EINSTEIN)

Contribution ID: 57

Type: **not specified**

B → K^{*}l $\bar{l}$ and B[±] → tau ν from Belle

Tuesday 10 October 2006 10:30 (20 minutes)

Presenter: VILLA, Stefano (Lausanne)

Session Classification: WG2, Tuesday morning (VRVS: Virtual Room EINSTEIN)

Contribution ID: 58

Type: **not specified**

CKM angles from Babar

Tuesday 10 October 2006 11:30 (20 minutes)

Presenter: CAVOTO, Luca (Rome)

Session Classification: WG2, Tuesday morning (VRVS: Virtual Room EINSTEIN)

Contribution ID: 59

Type: **not specified**

ICPV results from Belle

Tuesday 10 October 2006 12:00 (20 minutes)

Presenter: HAZUMI, Masashi (KEK)

Session Classification: WG2, Tuesday morning (VRVS: Virtual Room EINSTEIN)

Contribution ID: **60**

Type: **not specified**

B- $\rightarrow$ h+h- at LHCb

Tuesday 10 October 2006 12:30 (20 minutes)

Presenter: SARTI, Alessio (LNF -INFN)

Session Classification: WG2, Tuesday morning (VRVS: Virtual Room EINSTEIN)

Contribution ID: **61**

Type: **not specified**

Rare Hadronic $b \rightarrow s$ and $b \rightarrow d$ transitions (BaBar)

Tuesday 10 October 2006 14:00 (20 minutes)

Presenter: BEVAN, Adrian (QMUL)

Session Classification: WG2, Tuesday afternoon (VRVS: Virtual Room EINSTEIN)

Contribution ID: **62**

Type: **not specified**

A_SL, DeltaGamma_s, phi_s

Tuesday 10 October 2006 14:30 (20 minutes)

Presenter: BURDIN, Sergey (Fermilab)

Session Classification: WG2, Tuesday afternoon (VRVS: Virtual Room EINSTEIN)

Contribution ID: 63

Type: **not specified**

Study of the decay $B_s \rightarrow J/\psi \phi$ with the CMS detector

Tuesday 10 October 2006 15:00 (20 minutes)

Presenter: WILKE, Lotte (Uni Zuerich)

Session Classification: WG2, Tuesday afternoon (VRVS: Virtual Room EINSTEIN)

Contribution ID: **64**

Type: **not specified**

Missing particle reconstruction using vertexing

Tuesday 10 October 2006 15:30 (15 minutes)

Presenter: STARODUMOV, Andrey (ETH Zuerich)

Session Classification: WG2, Tuesday afternoon (VRVS: Virtual Room EINSTEIN)

Contribution ID: 65

Type: **not specified**

Tools (where we are)

Tuesday 10 October 2006 16:30 (20 minutes)

Presenter: HEINEMEYER, Sven (IFCA (CSIC-UC))

Session Classification: WG2, Tuesday afternoon (VRVS: Virtual Room EINSTEIN)

Contribution ID: **66**

Type: **not specified**

Flavor benchmarks

Tuesday 10 October 2006 16:50 (20 minutes)

Presenter: HEINEMEYER, Sven (IFCA (CSIC-UC))

Session Classification: WG2, Tuesday afternoon (VRVS: Virtual Room EINSTEIN)

Contribution ID: **67**

Type: **not specified**

Discussion

Tuesday 10 October 2006 17:30 (30 minutes)

Session Classification: WG2, Tuesday afternoon (VRVS: Virtual Room EINSTEIN)

Contribution ID: **68**

Type: **not specified**

Convenors and study group contacts: Write-up matters

Wednesday 11 October 2006 09:00 (4 hours)

Session Classification: WG2, Wednesday morning (VRVS: Virtual Room EINSTEIN)

Contribution ID: 69

Type: **not specified**

How can CP phases contribute to LFV processes ?

Wednesday 11 October 2006 10:00 (25 minutes)

We discuss the dependence of the rates of LFV processes $\mu \rightarrow e + \gamma$, $\tau \rightarrow e + \gamma$, $\tau \rightarrow \mu + \gamma$ ($l_i \rightarrow l_j + \gamma$) and their ratios in MSSM with right-handed neutrinos on CP phases. We focus on the case of quasi-degenerate in mass heavy Majorana neutrinos. The three types of light neutrino mass spectrum - normal hierarchical, inverted hierarchical and quasi-degenerate - are considered.

Presenter: Dr SHINDOU, Tetsuo (SISSA)

Session Classification: WG3, Wednesday morning

Contribution ID: 70

Type: **not specified**

Discussion of the Yellow Book contribution

Wednesday 11 October 2006 11:30 (1h 30m)

Session Classification: WG3, Wednesday morning

Contribution ID: 71

Type: **not specified**

Wtb Anomalous Top Quark Couplings

Tuesday 10 October 2006 12:00 (15 minutes)

Presenter: ONOFRE, Antonio

Session Classification: WG1, Tuesday morning

Contribution ID: 72

Type: **not specified**

WG1, convener meeting

Monday 9 October 2006 16:30 (1h 30m)

Session Classification: WG1, Monday afternoon

Contribution ID: 73

Type: **not specified**

Summary of the EDM and g-2 miniworkshop

Wednesday 11 October 2006 15:00 (30 minutes)

Presenter: Dr SEMERTZIDIS, Yannis (BNL)

Session Classification: Concluding plenary session (VRVS: Virtual Room EINSTEIN)

Contribution ID: 74

Type: **not specified**

Neutrino Masses and Mixing in Split Supersymmetry

Wednesday 11 October 2006 10:30 (25 minutes)

We analyze the possibility of generating masses and mixing angles to neutrinos via bilinear R-Parity and lepton number violation alone (not trilinear).

Presenter: Dr DIAZ, Marco Aurelio (Universidad Catolica de Chile)

Session Classification: WG3, Wednesday morning

Contribution ID: 75

Type: **not specified**

Neutralino spin measurement with ATLAS

Monday 9 October 2006 14:55 (20 minutes)

Presenter: Dr VENTURA, Andrea (INFN Lecce)

Session Classification: WG1, Monday afternoon

Contribution ID: 76

Type: **not specified**

FCNC top decays

Tuesday 10 October 2006 12:25 (20 minutes)

Presenter: BENUCCI, Leonardo

Session Classification: WG1, Tuesday morning

Contribution ID: 77

Type: **not specified**

Large Electroweak Logarithms in Heavy Quark Decay at LHC

Tuesday 10 October 2006 10:00 (20 minutes)

Presenter: GRUZZA, Alessia

Session Classification: WG1, Tuesday morning

Contribution ID: 78

Type: **not specified**

CMS benchmark analysis

Tuesday 10 October 2006 17:10 (20 minutes)

Presenter: SCHMITT, Michael (University of Florida)

Session Classification: WG2, Tuesday afternoon (VRVS: Virtual Room EINSTEIN)

Contribution ID: 79

Type: **not specified**

Bs -> Xs gamma at NNLO

Wednesday 11 October 2006 15:30 (30 minutes)

The B -> Xs gamma branching ratio estimate at the next-to-next-to-leading order in QCD is discussed. Constrains on certain beyond-SM effects are updated.

Presenter: MISIAK, Mikolaj (Warsaw)

Session Classification: Concluding plenary session (VRVS: Virtual Room EINSTEIN)

Contribution ID: **80**

Type: **not specified**

New Physics in $b \rightarrow sl+l^-$

Monday 9 October 2006 16:00 (10 minutes)

Presenter: BOBETH, Christoph (Dortmund)

Session Classification: WG2, Monday afternoon (VRVS: Virtual Room EINSTEIN)

Contribution ID: **81**

Type: **not specified**

WG progress reports

Wednesday 11 October 2006 14:00 (1 hour)

Session Classification: Concluding plenary session (VRVS: Virtual Room EINSTEIN)

Contribution ID: **82**

Type: **not specified**

short introduction

Monday 9 October 2006 14:00 (5 minutes)

Presenter: CONVENERS

Session Classification: WG1, Monday afternoon

Contribution ID: **83**

Type: **not specified**

Rare B-decay backgrounds studies - update

Tuesday 10 October 2006 15:50 (15 minutes)

Presenter: NIKITINE, Nicolai (Moscow)

Session Classification: WG2, Tuesday afternoon (VRVS: Virtual Room EINSTEIN)