

My Brief Curriculum Vitae (updated Jan 14, 2014)

Professor Dr. Ahmad Kamal Yahya FMASS

Faculty of Applied Sciences,
Universiti Teknologi MARA, 40450
Shah Alam, Selangor.

Emails:

ahmad191@salam.uitm.edu.my

dr_ak_yahya@yahoo.com

Fax: +603-55444562

Age: 53 years old

Family: Wife (1) and children (6)

Internet Links:

<http://www.drahmadkamal.uitm.edu.my/>

<http://www.scopus.com/authid/detail.url?authorid=7005774434>

Date of Initial Appointment at UiTM: 16th June 1986.

Academic Qualifications:

- B. Sc. in Physics (1979-1983) at Ohio University, Athens, Ohio, USA.
- M.Sc. in Physics (1984-1985) at Northern Illinois University, Dekalb, USA.
- Ph.D. (Physics) (1996-2000) at Universiti Kebangsaan Malaysia, Malaysia.

Service to the University and Professional Memberships:

- Permanent chairman, Pure Science Research Cluster, Universiti Teknologi Mara (Pengerusi tetap, Kluster Sains Tulen, Universiti Teknologi Mara); 2013- present
- Fellow, Malaysian Solid State Science and Technology Society (MASS): 2012- present
- **Chairman, School of Physics and Materials Studies**, Faculty of Applied Sciences, Universiti Teknologi MARA, Shah Alam Selangor: (2006-2009).
- **Council Member (Elected)** of Malaysian Solid State Science and Technology Society (MASS): 2007-2009.



- **Life Member** of Malaysian Solid State Science and Technology Society (MASS): Since 2001
- **Fellow** of Malaysian Solid State Science and Technology Society (MASS): Since 2012
- **Life Member** of Malaysian Institute of Physics (MIPM no. 609): Since 1990
- Ordinary Member of Materials Research Society Singapore: 2003-2007.
- Ordinary Member of Malaysian Non-destructive Testing Society: 2007- present.

Academic Awards:

1. **Anugerah Penyelidik Unggul (Prominent Researcher Award)** UiTM 2010
2. **UiTM Excellent Service Award(s)** 2008, 2005, 2000.
3. **Vice Chancellor's Award for recipient of biggest research grant** – 2006.
4. **Award for Academic Staff (FSG)** Active in Publication (Scopus) – 2009.
5. **Award for Faculty of Applied Sciences Staff** with Top-10 Citations in Scopus listed journals – 2009.
6. Recipient of **Award for Faculty of Applied Sciences Staff with Highest Research Grant** in 2007.
7. **Award for Faculty of Applied Sciences Staff with Most Research Grant** in 2007.
8. **Best Poster Paper Award** at PERFIK2009 Conference.
9. **Best Poster Paper Award** at Superconductivity Theory and Tapes Technology Workshop 2004
10. **Best Paper Award (Science and Technology)** at Conference on Scientific and Social Research 2003 (CSSR 2003)
11. **UiTM Excellent Award for Research 2003** for Faculty of Applied Sciences
12. **Award for Best Basic Research 2001** of Bureau of Research and Consultancy, UiTM.

Invention Awards:

1. **IID 2010-- Invention, Innovation & Design- Bronze Medal:** October 12, 2010- Ca-stabilized Eu123 Oxygen Sensor
2. **IID-2010 -Innovation and Design Exhibition Bronze Medal:** 13 Jan 2010 – Magnetic Sensors
3. **IID2009 (FSG) Silver Medal:**14-Oct-09 – Oxygen Ho123 Sensor
4. **IID2009 (FSG) Bronze Medal:**14-Oct-09– Magnetic Sensor

5. **IID 2008 Gold Medal:** 25-27 Mac 2008– Ceramic Oxygen Sensor
6. **IID2008 Special Award** from Medical Faculty: 25-27 Mac 2008 – Ceramic Oxygen Sensor
7. **ITEX 08 -International Invention, Innovation, Industrial Design and Technology Exhibition- Bronze Medal:** 9-11 May 2008–Ceramic Oxygen Sensor

Postgraduate Supervision:

Supervised 8 Ph.D.Students and 19 M.Sc. Students

List of National Research Grants (18) :

Recipient of Fundamental Research Grant, FRGS (8), ScienceFund (1), e-science (2), Intensified Research in Priority Area, IRPA (2) and Scientific Advancement Grant Allocation, SAGA (1) grants, RAGS (1) and RIF(3)

Editorial Board of International Journals(selected):

1. Regional Editor, **Journal of Applied Sciences (Scopus)** published by Academic Journals and ANSInet. (ISSN print: 1812-5654. ISSN online: 1812-5662), 2007 to present. Asian Network for Scientific Information, 2007- present
2. Regional Editor, **Journal of Applied Sciences Research (SCOPUS)** International Network for Scientific Information Publication (INSInet Publications) Editor in Chief Dr. Shaban D. Abou Hussein, Egypt ISSN (Print) 1816-157X ISSN (Online) 1819-544X 2009-present
3. Editorial Board member , **Australian Journal of Basic and Applied Sciences (SCOPUS)** International Network for Scientific Information, (INSInet Publications) Editors in Chief Prof. Dr. Abubakr Gomaa, Egypt Prof. Dr. Maybelle Saad Gaballah, Egypt ISSN 1991-8178 2009-present.

Book Editor (2):

1. Rahidzab Talib (chief ed.), **A. K. Yahya**, Azni Zain Ahmed, Nor Hadiani, 2003, **Issues and Research in Science: Advanced Materials and Energy** (Book) (ISBN 967-958-145-4 UPENA, UiTM Pusat Penerbitan Universiti (UPENA) UiTM, 2003
2. **A.K.Yahya** (chief ed.), M K Talari, T Winie, M K Abd-Rahman, M Z A Yahya, **Progress of Physics Research in Malaysia, AIP Proceedings vol. 1250** (Book) published by the American Institute of Physics (AIP), 2010 (ISBN 978-0-7354-0797-8)



Publication in Scopus/ISI Journals (73):

Published papers on novel superconductors, magnetic oxides, ceramic sensors and oxide glasses

Publications:

Selected recent papers in **Impact-factor** journals are listed below:

Suhadir Shamsuddin, Abdel-Baset M.A. Ibrahim, A K Yahya (2003), "Ultrasonic Anomaly near the Charge Ordering Transition in Sr-Doped $\text{Nd}_{0.3}\text{La}_{0.2}\text{Ca}_{0.5-x}\text{Sr}_x\text{MnO}_3$ Manganites", *Journal of Superconductivity and Novel Magnetism*, Accepted October 2003 (JOSC-2495R1)

Elastic and structural changes of $x\text{Na}_2\text{O}-(35-x)\text{V}_2\text{O}_5-65\text{TeO}_2$ glass system with increasing sodium. M.M. Umair, A.K. Yahya*. *Materials Chemistry and Physics*, Volume 142, Issues 2-3, 15 November 2013, Pages 549-555.

Enhancement of elastic properties by WO_3 partial replacement of TeO_2 in ternary $(80-x)\text{TeO}_2-20\text{PbO}-x\text{WO}_3$ glass system. S. Azianty, A.K. Yahya*. *Journal of Non-Crystalline Solids*, Volume 378, 15 October 2013, Pages 234-240.

Effect of ZnO addition and concurrent reduction of V_2O_5 on network formation and elastic properties of lead vanadate $(55-x)\text{V}_2\text{O}_5-45\text{PbO}-(x)\text{ZnO}$ glass system. S. Laila, S.N. Supardon, A.K. Yahya*. *Journal of Non-Crystalline Solids*. Volume 367, 1 May 2013, Pages 14-22.

Effect of Er substitution on ultrasonic anomaly in $\text{Dy}_{0.5-x}\text{Er}_x\text{Ba}_{0.5}\text{CoO}_3$ cobaltates. S. Shamsuddin, Abdel-Baset M.A. Ibrahim, A.K. Yahya*. *Ultrasonics*. Volume 53, Issue 6, August 2013, Pages 1084-1088.

Effects of Cr substitution and oxygen reduction on elastic anomaly and ultrasonic velocity in charge-ordered $\text{Nd}_{0.5}\text{Ca}_{0.5}\text{Mn}_{1-x}\text{Cr}_x\text{O}_{3-5}$ ceramics. S. Shamsuddin, Abdel-Baset M.A. Ibrahim, A.K. Yahya*. *Ceramics International*. Volume 39, Supplement 1, May 2013, Pages S185-S188.

Enhancement of extrinsic magnetoresistance behavior in BiFeO_3 doped $\text{La}_{0.8}\text{Ag}_{0.2}\text{MnO}_3$ ceramic. N. Ibrahim, A.K. Yahya*. *Ceramics International*. Volume 39, Supplement 1, May 2013, Pages S181-S184.

Influence of Pr^{3+} substitution at Ba-site of $\text{Eu}(\text{Ba}_{1-x}\text{Pr}_x)_2\text{Cu}_3\text{O}_{7-5}$ ceramic rods with hot-spot on oxygen sensing properties. M.I. Adzam, M.I.M. Yusof*, A.K. Yahya. *Ceramics International*. Volume 39, Supplement 1, May 2013, Pages S743-S746.

Superconducting fluctuation and infrared absorption of Cd-substituted $\text{Tl}_{0.9}\text{Bi}_{0.1}\text{Sr}_{1.8}\text{Yb}_{0.2}\text{Ca}_{1-x}\text{Cd}_x\text{Cu}_{1.99}\text{Fe}_{0.01}\text{O}_{7-5}$ ceramics. S. Ismail, A.K. Yahya*, Nawazish A. Khan. *Ceramics International*. Volume 39, Supplement 1, May 2013, Pages S257-S261.

I. Norezan, A.K. Yahya, M. K. Talari, Effect of $(\text{Ba}_{0.6}\text{Sr}_{0.4})\text{TiO}_3$ Doping on Dielectric Properties of $\text{CaCu}_3\text{Ti}_4\text{O}_{12}$ ceramic material, *Journal of Materials Science & Technology*, Volume 28, Issue 12, December 2012, Pages 1137-1144

M A Ghani, Z Mohamed, A K Yahya, Effects of Bi Substitution on Magnetic and Transport Properties of $\text{La}_{0.7-x}\text{Bi}_x\text{Ag}_{0.3}\text{MnO}_3$ Ceramics, *Journal of Superconductivity and Novel Magnetism*, Volume 25, Issue 7, pp 2395-2402

S A Yaacob, A K Yahya, M I M Yusof, R Hasham, Effect of Divalent Ion Substitution on Oxygen Sensing Properties of Hot-Spot Based $\text{Eu}_{1-x}\text{Ca}_x\text{Ba}_2\text{Cu}_3\text{O}_{7-d}$ and $\text{Eu}_{1-x}\text{Mg}_x\text{Ba}_2\text{Cu}_3\text{O}_{7-d}$ Ceramics, *Journal Ceramics International*, Volume 38, Issue 8, December 2012, Pages 6311-6319

S. Azianty, A.K. Yahya, M.K. Halimah, Effects of Fe_2O_3 replacement of ZnO on elastic and structural properties of $80\text{TeO}_2-(20-x)\text{ZnO}-x\text{Fe}_2\text{O}_3$ tellurite glass system, *Journal of Non-Crystalline Solids*, Volume 358, Issue 12-13, 1 July 2012, Pages 1562-1568

S. Ismail, A. K. Yahya, Nawazish A. Khan, Influence of Ce Substitution at Sr-Site on Superconducting Fluctuation Behavior and Infrared Absorption of $\text{Tl}_{0.9}\text{Bi}_{0.1}\text{Sr}_{2-x}\text{Ce}_x\text{Ca}_{0.9}\text{Y}_{0.1}\text{Cu}_{1.99}\text{Fe}_{0.01}\text{O}_7$ ($x = 0-0.20$) Ceramics, *Journal of Superconductivity and Novel Magnetism*, Volume 25, Issue 6, August 2012, pp 1849-1856

Ali Yusuf, A., Yahya, A.K., Md. Salleh, F., Formation and characterization of $(\text{Tl},\text{M})\text{Sr}_{1212}$ (M= Bi, Pb, Cr) superconducting ceramics, *Malaysian Journal of Analytical Sciences*, Volume 16, Issue 1, 2012, Pages 12-17

F.Md. Salleh, A. K. Yahya, M.H. Jumali, Enhancing the sinterability of chemically-derived Tl_{1212} superconducting powders using nano-sized MgO as sintering aid, *Advanced Materials Research* Vols 418-420, pp. 914-917

Sabri, N. S., Yahya, A.K., Talari, M.K., Emission Properties of Mn doped ZnO Nanoparticles prepared by

Mechanochemical Processing, *Journal of Luminescence*, Volume 132, Issue 7, July 2012, Pages 1735-1739

A. Ali Yusuf, A.K. Yahya, Nawazish A. Khan, F. Md. Salleh, E. Marsom, N. Huda, Effect of Ge^{4+} and Mg^{2+} doping on superconductivity, fluctuation induced conductivity and interplanar coupling of $\text{TlSr}_2\text{CaCu}_2\text{O}_{7-5}$ superconductors Original Research Article *Physica C: Superconductivity*, Volume 471, Issues 11-12, June 2011, Pages 363-372

N. Baizura, A.K. Yahya, Effects of Nb_2O_5 Replacement by Er_2O_3 on elastic and structural properties of $75\text{TeO}_2-(10-x)\text{Nb}_2\text{O}_5-15\text{ZnO}-(x)\text{Er}_2\text{O}_3$ glass Original Research Article *Journal of Non-Crystalline Solids*, Volume 357, Issue 15, 15 July 2011, Pages 2810-2815

N. Ibrahim, A.K. Yahya, S.S. Rajput, S. Keshri, M.K. Talari, Double metal-insulator peaks and effect of Sm^{3+} substitution on magnetic and transport properties of hole-doped

$\text{La}_{0.85}\text{Ag}_{0.15}\text{MnO}_3$ Original Research Article *Journal of Magnetism and Magnetic Materials*, Volume 323, Issue 16, August 2011, Pages 2179-2185

M. Hassan, A.K. Yahya & T. Okamoto, Effect of BaAl_2O_4 Addition on Power Consumption and Oxygen Sensing Response of Er123 Ceramic Rods Utilizing Hot-Spot Phenomenon, *Sains Malaysiana*, Vol 40 Number 1 January 2011 page 27 - 33

Sabri, N. S., Yahya, A. K., Talari, M. K., Structural and optical properties of $\text{Zn}_{1-x}\text{Mn}_x\text{O}$ nanoparticles prepared by mechanochemical synthesis, *Materials Research Innovation*, Volume 15, Supplement 2 pp. s123-s126(4)

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Ibrahim, N; Yahya, A. K., Double metal-insulator peaks and effect of Dy^{3+} substitution on transport and magnetic properties of hole doped $\text{La}_{0.8}\text{Ag}_{0.2}\text{MnO}_3$, *Materials Research Innovation*, Volume 15, Supplement 2 pp. s221-s224(4)

Ali Yusuf, A; Yahya, A K; Khan, N A, Effect of Ge substitution on excess conductivity and infrared absorption of $\text{Tl}_{0.85}\text{Cr}_{0.15}\text{Sr}_{1-x}\text{Ge}_x\text{CaCu}_2\text{O}_7$ superconducting ceramics, *Materials Research Innovation*, Volume 15, Supplement 2 pp. s118-s122(5)



Rajmi, R., **Yahya, A. K.**, Yusof, M.I.M., Effect of MgTiO₃ doping on dielectric and elasticity properties of CaCu₃Ti₄O₁₂ (CCTO) ceramics, **Australian Journal of Basic and Applied Sciences** 5 (8), pp. 405-416

N. B. Mohamed, **A. K. Yahya**, M. S. M. Deni, S. N. Mohamed, Halimah M. K., Sidek H. A. A., Effects of Concurrent TeO₂ Reduction and ZnO Addition on Elastic and Structural Properties of (90-x)TeO₂-10Nb₂O₅-(x)ZnO Glass, **J. Non-Cryst. Solids**, Volume 356, Issues 33-34, 15 July 2010, Pages 1626-1630

N. A. Rasih, **A.K. Yahya**, M. I. Yusof, Ultrasonic Velocity and Oxygen-retated Elastic Anomalies in Zn²⁺- substituted (Dy,Ca)Ba₂Cu_{3-y}Zn_yO_{7-d} Superconductors, **Modern Physics Letters B**, Vo1 I. 24, No. 32 (2010) 1–13

M. Hassan, **A.K. Yahya**, Influence of hot-spot temperature on oxygen sensing response behavior of Er123 ceramic rods with hot spot, **Journal of Alloys and Compounds**, Volume 499, Issue 2, 11 June 2010, Pages 206-211

Nurul H. Ahmad, Nawazish A.Khan, **A.K. Yahya**, Superconducting fluctuation behavior and infrared absorption properties of Tl_{1-x}Cu_xSr_{1.6}Yb_{0.4}CaCu₂O_{7-δ} and Tl_{0.5}Pb_{0.5}Sr_{2-y}Mg_yCa_{0.8}Yb_{0.2}Cu₂O_{7-δ} ceramics, **Journal of Alloys and Compounds**, Elsevier Science, Netherlands, Volume 492, Issues 1-2, 4 March 2010, Pages 473-481

M. F. Bakar, **A.K. Yahya**, Distinct effects of Al³⁺ substitution at Cu-site and Al₂O₃ addition on step-like elastic anomalies and electron-phonon coupling constant in EuBa₂Cu₃O_{7-δ} superconductors, **Journal of Alloys and Compounds**, Elsevier Science, Netherlands Volume 490, Issues 1-2, 4 February 2010, Pages 358-365

M. Hassan, **A.K. Yahya**, Oxygen response of hot spot on DyBa₂Cu₃O_{7-x} ceramic sensors fabricated under different heat treatments, **Materials Research Innovation** (Scopus, ISI Thompson), Maney Publishing, USA, Vol. 13 No. 3 September 2009, pg. 357

A. K. Yahya, B. Musa, Effects of Al and Cr substitution for Cu on superconductivity and structure of EuBaSrCu₃O_{7-δ} Ceramics, **Materials Research Innovation** (Scopus, ISI Thompson), Maney Publishing, USA, Vol. 13 No. 3 September 2009, pg. 304

N. Huda, **A.K. Yahya**, Effects of Cu substitution on superconductivity and excess conductivity of Tl_{1-x}Cu_xSr_{1.8}Yb_{0.2}CaCu₂O_{7-δ} (x=0-0.6) ceramics **Materials Research Innovation** (Scopus, ISI Thompson), Maney Publishing, USA Vol. 13 No. 3 September 2009, pg. 406

N. A. Aini, M. I. M. Yusof, N. Huda, Z. Mohamed and **A. K. Yahya**, Electrical Transport and Low-Field Magnetoresistance Properties of (La_{1-x}Yb_x)_{2/3}Ca_{1/3}MnO₃ ceramics **Materials Research Innovation** (Scopus, ISI Thompson), Maney Publishing, USA, Vol. 13 No. 3 September 2009, pg. 400

M. I. Yusof, **A.K. Yahya**, Z. Salleh, M.H. Jumali, Superconductivity and Enhancement of Critical Current Density of Ta-substituted TlSr1212 with Addition of Nanosize MgO, **Materials Research Innovation** (Scopus, ISI Thompson), Maney Publishing, USA, Vol. 13 No. 3 September 2009, pg. 364-367(4)

A.K. Yahya, Gruneisen Parameter and Anharmonic Contribution to Temperature Dependent Ultrasonic Velocity In RE-based and TI-based Superconductors **Materials Research Innovation** (Scopus, ISI Thompson), Maney Publishing, USA, Vol. 13 No. 3 September 2009, pg. 276

Rasih, N.A., **Yahya, A.K.**, Effect of Ba-site substitution by Sr on ultrasonic velocity and electron-phonon coupling constant of DyBa_{2-x}Sr_xCu₃O₇ superconductors, **Journal of Alloys and Compounds**, Elsevier Science, Netherlands, Vol. 480 (2) 2009, pg. 777-781.

Yahya A.K., Abdullah W.F., Imad H., Jumali M.H., Changes in doping state of (Ti,Pb)Sr1212 superconductors with Yb substitution at Sr site, **Physica C**, Elsevier Science, Netherlands, Vol. 463-465, October 2007, pg. 474-477

Hamadneh I., Agil A., **Yahya A.K.**, Halim S.A., Superconducting properties of bulk Bi_{1.6}Pb_{0.4}Sr₂Ca_{2-x}Cd_xCu₃O₁₀ system prepared via conventional solid state and coprecipitation methods, **Physica C: Superconductivity**, Elsevier Science, Netherlands, Vol. 463-465, 2007, pg. 207-210

F. Md. Salleh, **A. K. Yahya**, M. H. Jumali and Z. Awang, Synthesis of High Purity Tl1212 Superconductor with Ultra fine Grains from Coprecipitated TI-free Precursor Route, **Journal of Materials Science: Materials in Electronics**, Springer, USA, Vol.18, 2007 pg. 843-846

F. Md. Salleh, **A. K. Yahya**, H. Imad and M.H. Jumali, Synthesis and Formation of TlSr1212 Superconductors from

Coprecipitated Oxalate Precursors, **Physica C: Superconductivity**, Elsevier Science, Netherlands, Vol. 426-431, 1 October 2005, pg. 319-324

A. K. Yahya, W.F. Abdullah, M.H. Jumali, H. Imad, R. Abd-Shukor, Superconducting and normal state behaviors of (Ti,Bi)Sr_{2-x}TixCa_{0.9}Y_{0.1}Cu₂O₇ ceramics, **Journal of Ceramics International**, Elsevier Science, Netherlands, Vol. 30, 2004 pg. 1591-1595

N.A.Hamid, B.Musa, **A.K. Yahya**, M.H. Jumali, R.Abd-Shukor, Effects of elemental substitutions involving V and Cr on superconductivity of TlSr₂(Ca,Y)₂Cu₂O₇ Ceramics, **Journal of Ceramics International**, Elsevier Science, Netherlands, Vol. 30, 2004 pg. 1585-1589

A. K. Yahya, N.A. Hamid, R. Abd-Shukor, H. Imad, Anomalous Elastic response of REBa_{2-x}HoxCu₃O₇ (RE=Ho) Ceramic Superconductors, **Journal of Ceramics International**, Elsevier Science, Netherlands, Vol. 30, 2004 pg. 1579-1601

F. M. Salleh, **Yahya, A. K.**, H. Imad & Abd-Shukor, R. Effects of AgO, Ag₂O and AgNO₃ addition on the superconducting properties of Tl₂Ba₂CaCu₂O₈, **Materials Science and Engineering. B**, Elsevier Science, Netherlands, Vol. 98, 2003 pg. 17-20

Yahya, A. K., F. M. Salleh, N. Ibrahim & Abd-Shukor, R. Effects of Ti substitution on superconductivity of TlSr1212 ceramics, **Physica C.**, Elsevier Science, Netherlands, Vol.388-389C, 2003 pg. 371-372

A.K. Yahya, R. Abd-Shukor, Effects of Oxygen Removal on Ultrasonic Attenuation And Elastic Behavior of PrBa₂Cu₃O_x, **Supercond. Sci. & Technology**, Institute of Physics (IOP) Publishing, UK, Vol. 15, 2002, pg. 302-306

Yahya, A.K., Abd-Shukor, R., The effects of oxygen content and Pr substitution on ultrasonic velocity in ErBa₂Cu₃O_{7-d} superconductors **Superconductor Science and Technology**, 11 (2), 1998, pp. 173-178

"I serve knowledge for the sake of knowledge and not for money." - Abu Rayhan Al-Biruni (when the ruler of his time sent him three camel-loads of silver coins in appreciation of his encyclopedic work Al-Qanoon al-Masoodi)

