

10401 Town Park Dr. Houston, TX 77072 Laboratory Director: Lipid Science Director: Tel: 713-621-3101 800-227-5227 CLIA ID 45D0710715 Fax: 713-621-3234 John F. Crawford, Ph.D. Jan M. Troup, Ph.D.

Batch: B5853

Accession No: L75012

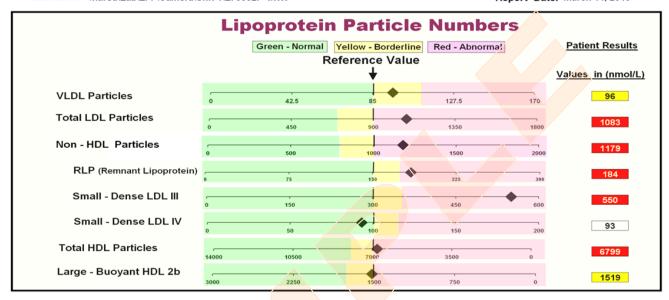
Draw March 7, 2013
Report Date: March 14, 2013

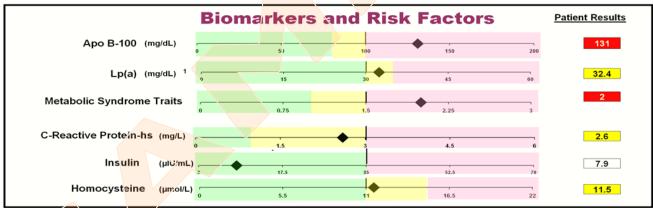
DOB: February 23, 1946

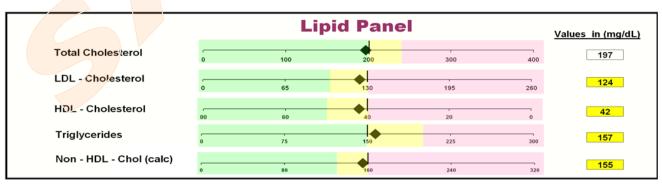
Physician: Cardiology, M.D.

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Name: Doe, John







Comments:

Clinical Interpretation Guide to the LPP™Test

Step 1. Primary Risk Assessment

- Lipoprotein non-HDL particle numbers and other lipid and non-lipid risk factors may show a greater patient risk than a standard lipid panel and therefore, a greater LDL reduction than indicated by a standard lipid panel. Non-HDL lipoprotein particle numbers and/or Apo B-100 are measures of the number of atherogenic lipoprotein particles and are compliant with the recent consensus statement from the American Diabetes Association and the American College of Cardiology¹ stating that lipoprotein particle numbers are more predictive of CVD risk than cholesterol.
- Moderate to elevated triglycerides can cause the lipoproteins to be cholesterol depleted or triglyceride enriched and these
 patients will show a greater CVD risk from non-HDL particle numbers or Apo B-100 than from a standard lipid panel.
 This occurs in about 30% of the population.

Step 2. Modify Risk Using Metabolic Syndrome Traits, Lp(a) and Inflammation Risk Markers

- Evaluate possible Metabolic Syndrome by combining the lipid traits from the LPP[™] test with possible hypertension, obesity
 and high glucose. Three total traits is a diagnosis of Metabolic Syndrome and raises the CVD risk to the next level. Also
 check for insulin resistance using the LPP[™] fasting insulin value.
- Take into account additional risk from elevated Lp(a) or inflammation markers such as hs-CRP or Lp-PLA2 if ordered, in determining the final treatment goals. Also consider non-lipid risk factors such as hypertension, obesity, high glucose, smoking, family history and other medical history.
- The risk assessment and treatment goal from **Step 1** should be adjusted in light of the presence of these additional Biomarkers and Risk Factors.
- A standard directly measured cholesterol Lipid Panel is presented at the bottom of the report for comparison to
 previously determined lipid results.

Step 3. Determine Therapeutic Approach Based On the Lipid Subgroup Distribution, Lp(a) and Therapeutic Guidelines

- Using the risk level established in Step 2 and treatment goals from the NCEP guidelines, determine if VLDL, LDL subgroups, HDL subgroups and/or Lp(a) should be therapeutic targets.
- The LPP™ particle numbers by subgroup and Lp(a) each have a specific therapeutic approach that is most effective.

 Often, combination therapy is needed to address the different risk areas.
- A special HDL species enriched in Apo C-1 is atherogenic but displays health attributes². It is generally identified by high HDL>70mg/dL, high HDL 2b > 4000 nmol/L with a high HDL peak or hump extending into LDL IV region and low TG's < 70 mg/dL. Check for CVD development with a CIMT, a Coronary Calcium Score or other method to confirm.
- Refer to the LPP™ Therapeutic Guidelines for lipoprotein subgroup specific information.



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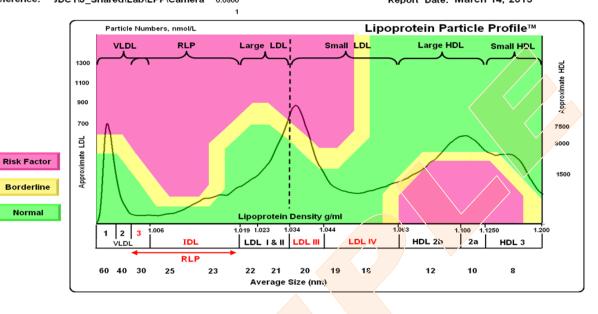
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Lipoprotein Pa <mark>rticle Numb</mark> ers (nmol/L)						
	Value		Reference Value	Alert (Notes Page 3)		
VLDL Particles	9/3		<85	Borderline High (12)		
Total LDL Particles	1083		<900	High (13)		
Non - HDL Particles	1/179		<1000	High (19)		
RLP (Remnant Lipoprotein)	184		<150	High (14)		
Small - Dense LDL III	550		<300	High (15)		
Small - Dense LDL !V	93		<100			
Total HDL Part <mark>icles</mark>	6799		>7000	Low (17)		
Large - Buoyant HDL 2b	1519		>1500	Borderline-M, Low-F (18)		

	Biomarkers and Risk Factors			
	<u>Value</u>	Reference Value	Alert (Notes Page 3)	
Apo (B-100 (mg/dL)	131	40 - 100	High (20)	
Lp(a) (mg/dL)	32.4	6.0 - 29.9	Borderline (6)	
Metabolic Syndrome Tra	its 2	Zero	Probable (8)	
C-Reactive Protein-hs (m	g/L) 2.6	<3.0	Borderline (9)	
Insulin (นใป/mL)	7.9	4.0 - 35.0		
Homocysteine (umol/L)	11.5	<11.0	Borderline High (11)	

Lipid Panel (mg/dL)					
	<u>Valu</u> e	Reference Value	Alert (Notes Page 3)		
Total Cholesterol	197	<200			
LDL - Cholesterol	124	40 - 130	Borderline High (2)		
HDL - Cholesterol	42	>40	Borderline (3)		
Triglycerides	157	30 - 150	Borderline High (4)		
Non - HDL- Chol (calc)	155	<160	Borderline (5)		

See online at http://www.nbbi.nih.gov/guidelines/to-lesterol/stalance.htm		SpectraCell	l Clinical Suggestions for Al	ert References				
2 See online at http://www.nibi.nih.co/puisblenes/cholesterol/stalenes/htm. 0-1 Ruk factors: Goal <160 mg/dl 2 Ruk factors: Goal <130 mg/dl 1 Ruk factors: Goal <100 mg/dl (os 70 mg/dl) 1 Lev HDL-Cholesterol (HDL-C) Follow ATPII Guidelines for treat ment goals and strategy: 2 See online at http://www.nibin.nch.ncv/puisblenes/cholesterol/stalenes.htm Males: <40 mg/dl. (is 1 of 5 traits for Metabolic Syndrome) 2 Revated Tirichrecides (TG): TO =150 mg/dl is 1 of 5 traits for Metabolic Syndrome) 2 Revated Tirichrecides (TG): TO =150 mg/dl is 1 of 5 traits for Metabolic Syndrome) 3 Revated Tirichrecides (TG): TO =150 mg/dl is 1 of 5 traits for Metabolic Syndrome. (Triglyceride levels can be elevated if patient in non-fatirity Follow ATPIII Guidelines for treatment goals and strategy: 5 See online at http://www.nibi.indh.co/puisblenes/cholesterol/stalenes.htm	1		Elevated Total Cholesterol (TC): Borderline 200-240 mg/dL consider treatment when patient has 2 or more risk factors.					
0-1 Ruk factors: Goal <160 mg/dl 2 Rik factors: Goal <130 mg/dl 4 Righ Ruk/CRID or CRD equivalent Goal: <100 mg/dl (or 70 mg/dl) Lew HDL-Cholesterol (HDL-C): Follow ATPIII Guidelines for treatment goals and strategy: See online at hitty flower shells in the project of the control of the co								
0-1 Risk factors: Goal +150 mg/dl Low HDL-Cholesterol (HDL-Ch) Follow AT PIII Goaldines for treatment goals and strategy: See online at http://www.nbl.in.ch.poi/gaidelines/cholesteo/late/parkens.htm Males: 440 mg/dl. (is 1 of 5 traits for Metabolic Syndrome) Bereated Trightverides [1G]: TO >150 mg/dl is 1 of 5 traits for Metabolic Syndrome) Bereated Trightverides [1G]: TO >150 mg/dl is 1 of 5 traits for Metabolic Syndrome) Bereated Trightverides [1G]: TO >150 mg/dl is 1 of 5 traits for Metabolic Syndrome. Bereated Trightverides [1G]: TO >150 mg/dl is 1 of 5 traits for Metabolic Syndrome. Bereated Trightverides [1G]: TO >150 mg/dl is 1 of 5 traits for Metabolic Syndrome. Bereated Trightverides [1G]: TO >150 mg/dl is 1 of 5 traits for Metabolic Syndrome. Bereated Trightverides [1G]: TO >150 mg/dl is 1 of 5 traits for Metabolic Syndrome. Bereated Trightverides [1G]: TO >150 mg/dl is 1 of 5 traits for Metabolic Syndrome. Bereated Trightverides [1G]: TO >150 mg/dl is 1 of 5 traits for Metabolic Syndrome. Bereated Trightverides [1G]: TO >150 mg/dl is 1 of 5 traits for Metabolic Syndromes. Bereated Trightverides [1G]: To >150 mg/dl is 1 of 5 traits for Metabolic Syndromes. West High: S00 mg/dl. West High: S00 mg/	2	See online at http://www.nhlbi.nih.gov/guidelines/cholesterol/atglance.htm						
See online at http://www.nibis inth.pot/guidelines/cholesterol/strlance htm Males: 440 mg/dL (is 1 of 5 traits for Metabolic Syndrome) Rewated Trichverides (TG): TG=150 mg/dL (is 1 of 5 traits for Metabolic Syndrome)				Goal: <100 mg/dl (or 70 mg/dl)				
Males: 40 mg/dl. Fennies: <50 mg/dl.								
(is 1 of 5 traits for Metabolic Syndrome) (is 1 of 5 traits for Metabolic Syndrome (Triglyceride lavels can be elevated if patient in non-fasting.) Follow ATPUII Guidalines for treatment goals and strategy: 4 See online at http://www.nbbi.ruli.gov/guidalines/cholestos/latalance.htm Borderline: 150-199 mg/dL Borderline: 150-199 mg/dL Borderline: 150-199 mg/dL Consider Genetic disorders. Non-HDL-C; A cholesterol me assument that predicts risk better than LDL-C per the ACC & ADA consensus statement. Optimal: «130 mg/dL Borderlines Risk: 130-160 mg/dL High Eg/dA. Optimal: «130 mg/dL Borderlines Risk: 130-160 mg/dL High Eg/dA. Optimal: «130 mg/dL Borderlines Risk: 130-160 mg/dL High Eg/dA. Optimal: «130 mg/dL Borderlines Risk: 130-160 mg/dL High Eg/dA. Optimal: «130 mg/dL Borderlines Risk: 130-160 mg/dL High Lp-PLAZ. (300 to 235 mg/L borderline,» 2 235 mg/L elevated by the secretics, or statin drugs: Treatment for high Lp(s) is typically maken and aggressive LDL treatment. Metabolic Syndrome Traiter: This test reports only 2 of the 5 traits associated with the ATPIII Metabolic Syndrome Definition Elevated Traiters. Metabolic Syndrome Traiter: This test reports only 2 of the 5 traits associated with the ATPIII Metabolic Syndrome Definition Elevated Traiters. To (150 mg/dL), to mg/dL to obtain ment, 50 mg/dL in women). Additionally, this number adds a third feature (elevated mund of LDLIII and LDLIV particles) which corresponds injuly to metabolic syndrome/furulin resistance. Clinicians must confirm metabolic syndrome by adding values for weit circumference, fating blood pheros and blood pressure. See ATPIII guidalines. CReartive Pretein (he-CRP): Marker of Inflammation tied to increased cardiovascular risk andor metabolic syndrome. Test units may not correlate to other labs using different methods. Included the Atlanta (Tenderline 1) and the Atlanta of the Atlant	3			í .				
non-facting) Follow ATPIII Guidalines for treatment goals and strategy: See online at http://www.nhbi.unl.gov/guidalines/cholesterol/stalunce.htm Borderline: 150-199 mg/dl. Migh: 200-499 mg/dl. Connider Centric disorders. Non-HDL-C; A cholesterol me assurement that predicts risk better than LDL-C per the ACC & ADA consensus statement. Optimal <130 mg/dl. Borderline Risk : 130-160 mg/dl. High Lg-(a) is an inherited traat and does not respond to exercise, or statin drugs. Treatment for high Lp(a) is typically makin and aggressive LDL treatment. High Lg-PLAC. (200 to 235 mg/L horderline, > 235 mg/L elevated): Is associated with a two fold increased cardiovascular nik. High Lg-PLAC. (200 to 235 mg/L horderline, > 235 mg/L elevated): Is associated with a two fold increased cardiovascular nik. TG (150 mg/dl), Low PLD-C (440 mg/dl: mmen; 50 mg/dl. in women). Additionally, this number adds a third feature (elevated must of LDLIII and LDLIV particles) which corresponds highly to metabolic syndrome finusin nesistance. Clinicians must continue metabolic syndrome by adding values for wait circumfence, fatting blood phenose and blood pressure. See ATPIII guidelines. CReactive Protein (ha-CRP): Marker of Inflammation tied to increased cardiovascular risk Low Risk: 0-1 mg/L. Borderline: 13-3 mg/L. High: >3 mg/L. High: >3 mg/L. High: >3 mg/L. Bevated Homocysteine: Intermediate in methylation pathways—risk factor for CVD, stroke, Albeinness and ortseoporosis syndrome. Test units may not correlate to other labs using different methods: non-individual syndrome. Borderline: 11-15 mmo/L Desirable: ~11								
Borderline: 150-199 mg/dL High: 200-499 mg/dL Consider General General Consider General	4	Elevated Triglycerides (TG): TG > 150 mg/dl is 1 of 5 traits for Metabolic Syndrome. (Triglyceride levels can be elevated if patient is non-fasting.) Follow ATPIII Guidelines for treatment goals and strategy:						
Sem-HDL_C: A cholesterol me acusement that predicts risk better than LDL-C per the ACC & ADA consensus statement. Optimal < 3.0 mg/dL Borderline Risk: 3.0-160 mg/dL High Risk: >160 mg/dL								
Optimal: «130 mg/dL Borderline Risk: 130-160 mg/dL High Risk: >160 mg/dL High Risk: >160 mg/dL High Risk: >160 mg/dL High Risk: >160 mg/dL General Risk: 130 mg/dL Search Risk: 130 mg/		Non-HDL-C: A cholesterol me astrement tha	t predicts risk better than LDL-C per the ACC &	(U) (1) (U)				
High Le(a). (Le(a)>30.0): Lp(a) is highly associated with cardiovascular disease. Lp(a) is an inherited trait and does not respond to exercise, or statin drugs. Treatment for high Lp(a) is typically mixim and aggressive LDL treatment. High Le-PLA2. (200 to 235 mg/L borderline, > 235 mg/L elevated): Is associated with a two fold increased cardiovascular risk. Metabolic Syndrome Traits: This test reports only 2 of the 5 traits associated with the ATPIII Metabolic Sydrome Definition: Elevated Traits and LDL syndroments and produce and produc	5			AMERICA AND AND AND AND AND AND AND AND AND AN				
High Le-PLA2, (200 to 235 mg/L berefaine, > 235 mg/L elevated) Is associated with a two fold increased cardiovascular risk. Metabolic Syndrome Traits: This test reports only 2 of the 5 traits associated with the ATPIII Metabolic Syndrome Definition: Elevated Total (1) and DLIV particles) which corresponds highly to metabolic syndrome/meanin resistance. Chincian must confirm metabolic syndrome by adding values for wairt circumference, fasting blood glacore and blood pressure. See ATPIII guidelines. Creative Pretein (he-CRP): Marker of Inflammation tied to increased cardiovascular risk Low Risk: 0-1 mg/L Borderline: 1-3 mg/L High: >3 mg/L	Ş		Programme and the control of the second of the second					
Metabolic Syndrome Traits: This test reports only 2 of the 5 traits associated with the ATPIII Metabolic Syndrome Definition: Eleva TG (= 150 mg/dl), Low HDL-C (400 mg/dl), in women). Additionally, this number adds a third feature (elevated must of LDLII and LDLIV particles) which corresponds highly to metabolic syndrome/furulin resistance. Clinicians must confirm metabolic syndrome by adding values for waist circumference, fasting blood glacose and blood pressure. See ATPIII guidelines. CReactive Protein (No-CRP): Marker of Inflammation tied to increased cardiovascular risk and/or metabolic syndrome. Test units may not correlate to other labs using different methods. Insulin levels can be elevated if patient was non-fasting Confirm that patient was properly fasted before setting goals. Insulin levels can be elevated if patient was non-fasting Confirm that patient was properly fasted before setting goals. Insulin levels can be elevated if patient was non-fasting Confirm that patient was properly fasted before setting goals. Insulin levels can be elevated if patient was non-fasting Confirm that patient was properly fasted before setting goals. Insulin levels can be elevated if patient was non-fasting Confirm that patient was properly fasted before setting goals. Insulin levels can be elevated in methylation pathways-risk factor for CVD, stroke, Alzbeimers and osteoprovis Elevated Homocyvicine Intermediate in methylation pathways-risk factor for CVD, stroke, Alzbeimers and osteoprovis Elevated Homocyvicine Intermediate in methylation pathways-risk factor for CVD, stroke, Alzbeimers and osteoprovis Elevated Homocyvicine Intermediate in methylation pathways-risk factor for CVD, properly fasted before setting deals and continued and continued guidance by NCEP, however this correlates to triglyceride values of over 200 mg/dl. Patients with CVD patients to trigly ceride values of over 200 mg/dl. Patients with CVD patients with CVPD molid. Elevated Remnant Lipoprotein Patricle Number Guidance by	0							
TG (=150 mg/dl), Low HDL-C (=40 mg/dl, in mem; <50 mg/dl, in women). Additionally, this number adds a third feature (elevated munt of LDLIII and LDLIV particles) which corresponds highly to metabolic syndrome/msulin resistance. Clinicians must confirm metabolic syndrome by adding values for waist circumference, fasting blood glucose and blood pressure. See ATPIII guidelines. C-Reactive Protein (Bs-CRP): Marker of Inflammation tied to increased cardiovascular risk Low Risk: 0-1 mg/L Borderline: 1-3 mg/L High: >3 mg/L Hevated Inculuii. (Insulin > 35.0 uI/V/mL): High fasting insulin is associated with increased cardiovascular risk and/or metabolic syndrome. Test unit may not correlate to other labs using different methods. Insulin levels can be elevated if patient was non-fasting. Confirm that patient was properly fasted before setting goals. Bevated Homecyteine; Intermediate in methylation pathways- risk factor for CVD, stroke, Alzheimers and osteoporosis Bevated Homecyteine; Intermediate in methylation pathways- risk factor for CVD, stroke, Alzheimers and osteoporosis High VLDL Particle Number (VLDL > 35 mao/ID): No reported clinical guidance by NCEP, however this correlates to triglycenide values of over 200 mg/dl., high RLP and possible metabolic syndrome. Borderline, High to Very High LDL Particle Number (LDL > 700, 900, 1100 nmol/L). Patients with 2 or more risk factors are recommended to initiate therapeutic lifestyle changes and/or drug therapy to lower LDL < 900 mmol/L. Patients with CDL particle numbers greate than 1100 mmol/L are recommended to be treated aggressively. Evexted Remnant Lipoprotein Particle Number (LDL > 700, 900, 1100 nmol/L). Patients with LDL particle numbers greate than 1100 mmol/L are recommended to be treated aggressively. Evexted Remnant Lipoprotein Particle Number (LDL III). This rem NCEP risk factor is abeen shown to be highly correlated with CHD and should be monitored along with other risk factors during lifestyle, supplement and/or drug treatment. Omega-fatty acids	7	High Lp-PLA2. (200 to 235 mg/L borderli	High Lp-PLA2. (200 to 235 mg/L borderline, > 235 mg/L elevated): Is associated with a two fold increased cardiovascular risk.					
Low Risk: 0-1 mg/L Borderline: 1-3 mg/L High: >3 mg/L	8	TG (>150 mg/dl), Low HDL-C (<40 mg/dL in of LDLIII and LDLIV particles) which corresp	men,≤50 mg/dL in women). Additionally, this m onds highly to metabolic syndrome/insulin resist	umber adds a third feature (elevated mumb ance. Clinicians must confirm metabolic				
Borderline: 1-3 mg/L High: >3 mg/L		C-Reactive Protein (hs-CRP): Marker of In	nflammation tied to increased cardiovascular risk					
Syndrome. Test units may not correlate to other labs using different methods. Insulin levels can be elevated if patient was non-fasting. Confirm that patient was properly fasted before setting goals.	9	Low Risk: 0-1 mg/L	Borderline: 1-3 mg/L	High: >3 mg/L				
Borderline: 11-15 mmol/L Consider dictary changes and/or multivitamins/ B-complex supplements. High VLDL Particle Number (VLDL > 85 mmol/L): No reported clinical guidance by NCEP, however this correlates to triglyceride values of over 200 mg/dL, high RLP and possible metabolic syndrome. Borderline, High to Very High LDL Particle Number (LDL > 700, 900, 1100 nmol/L): Patients with 2 or more risk factors are recommended to initiate therapeutic lifestyle changes and/or drug therapy to lower LDL < 900mmol/L. Patients with CHD or CHD equivalents are recommended to begin LDL-lowering drug therapy to LDL < 700nmol/L. All patients with LDL particle numbers greate than 1100 mmol/L are recommended to be treated aggressively. Elevated Remnant Lipoprotein Particle Number (RLP > 150 nmol/L): This new NCEP risk factor has been shown to be highly correlated with CHD and should be monitored along with other risk factors during lifestyle, supplement and/or drug treatment. Omega-fatty acids have been shown to reduce triglycerides and RLP. Borderline to High LDL III Particle Number (LDL III> 300 nmol/L): Indicates an abundance of small-dense atherogenic LDL-particles. Management should be considered depending on LDL-C goals and risk factors. Reducing LDL-C and TG often will lower dense LDL particles. Hevated LDL IV (LDL IV> IU0 nmol/L): Indicated abundance of very small-dense atherogene particles. Lp(a) is found typically between d=1.05 and d=1.08 and often is located in the range for LDL IV. Treatment for high LDL IV and Lp(a) are very similar, typic maxim and aggressive LDL-C reduction. Low HDL particle count < 7000 nmol/L, 7000 - 8000 nmol/L is Borderline for Males and Low for Females: Indicates potentia atherogenic dyslipidemia. Beneficial therapies similar to those which raise HDL-C and reducing elevated TG (diet, exercise, niacin, omeg 3's) Non-HDL Particle Numbers: Non-HDL particle numbers is the best overall indicator of CVD risk. Optimal: <800 nmol/L ApoB: A measure of all non-HDL particle numbers.	10	syndrome. Test units may not correlate to other labs using different methods.						
Desirable: <11 mmol/L Consider dictary changes and/or multivitamins/ B-complex supplements. Desirable: <11 mmol/L High VLDL Particle Number (VLDL > 85 mmol/L): No reported clinical guidance by NCEP, however this correlates to triglyceride values of over 200 mg/dL, high RLP and possible metabolic syndrome. Borderline. High to Very High LDL Particle Number (LDL > 700, 900, 1100 mmol/L): Patients with 2 or more risk factors an recommended to initiate therapeutic lifestyle changes and/or drug therapy to lower LDL < 900mmol/L. Patients with CHD or CHD equivalents are recommended to begin LDL-lowering drug therapy to LDL <700mmol/L. All patients with LDL particle numbers greate than 1100 mmol/L are recommended to be treated aggressively. Elevated Remnant Lipoprotein Particle Number (RLP > 150 mmol/L): This new NCEP risk factor has been shown to be highly correlated with CHD and should be monitored along with other risk factors during lifestyle, supplement and/or drug treatment. Omegafatty acids have been shown to reduce triglycerides and RLP. Borderline to High LDL III Particle Number (LDL III-300 nmol/L): Indicates an abundance of small-dense atherogenic LDL-particles. Management should be considered depending on LDL-C goals and risk factors. Reducing LDL-C and TG often will lower dense LDL particles. Elevated LDL IV (LDL IV> IUU nmol/L): Indicated abundance of very small-dense atherogenic particles. Lp(a) is found typically between d=1.05 and d=1.08 and often is located in the range for LDL IV. Treatment for high LDL IV and Lp(a) are very similar, typic niacin and aggressive LDL-C reduction. Low HDL particle count <7000 nmol/L, 7000 - 3000 nmol/L is Borderline for Males and Low for Females: Indicates potentia atherogenic dyslipidemia. Beneficial therapies similar to those which raise HDL-C and reducing elevated TG (diet, exercise, niacin, omeg 3's) Risk Factor for HDL2b between 1500 and 1750 nmol/L is borderline for males and risk factor for females. Values less the 1500 is a risk factor for males: Non-HD		Elevated Homocysteine: Intermediate in me	thylation pathways- risk factor for CVD, stroke,	Alzheimers and osteoporosis				
Consider dictary changes and/or multivitamins/ B-complex supplements. Consider dictary changes and/or multivitamins/ B-complex supplements. Patients with Care Complex supplements. 12	11		Borderline: 11-15 mmol/L	Elevated: Above 15 mmol/L				
High VLDL Particle Number (VLDL > 85 nmol/L): No reported clinical guidance by NCEP, however this correlates to triglyceride values of over 200 mg/dL, high RLP and possible metabolic syndrome. Borderline, High to Very High LDL Particle Number (LDL > 700, 900, 1100 nmol/L): Patients with 2 or more risk factors are recommended to initiate therapeutic lifestyle changes and/or drug therapy to lower LDL < 900mmol/L. All patients with LDL particle numbers greate than 1100 mmol/L are recommended to be treated aggressively. Elevated Remnant Lipoprotein Particle Number (RLP > 150 nmol/L): This new NCEP risk factor has been shown to be highly correlated with CHD and should be monitored along with other risk factors during lifestyle, supplement and/or drug treatment. Omegafatty acids have been shown to reduce triglycerides and RLP. Borderline to High LDL III Particle Number (LDL III > 300 nmol/L): Indicates an abundance of small-dense atherogenic LDL-particles. Management should be considered depending on LDL-C goals and risk factors. Reducing LDL-C and TG often will lower dense LDL particles. Elevated LDL IV (LDL IV> IUU nmol/L): Indicated abundance of very small-dense atherogenic particles. Lp(a) is found typically between d=1.05 and d=1.08 and often is located in the range for LDL IV. Treatment for high LDL IV and Lp(a) are very similar, typic macin and aggressive LDL-C reduction. Low HDL particle count <7000 nmol/L, 7000 - 3000 nmol/L is Borderline for Males and Low for Females: Indicates potential atherogenic dyslipidemia. Beneficial therapies similar to those which raise HDL-C and reducing elevated TG (diet, exercise, miacin, omeg 3's) Risk Factor for HDL2b between 1500 and 1750 nmol/L is borderline for males and risk factor for females. Values less the 1500 is a risk factor for males: Non-HDL particle numbers: Son-HDL Borderline Risk: 800-1000 nmol/L. High Risk: >100 ms/dL. ApoB: A measure of all non-HDL particle numbers. Optimal: <800 ms/dL. Borderline Risk: \$80.100 ms/dL. High Risk: >100 ms/dL.	1000	Desirable: ≺11 mmol/L	의 경기 이 성격 기계를 가게 되었다면 그리고 있다면 가게 되었다면 다른데 없다고 있다.					
recommended to initiate therapeutic lifestyle changes and/or drug therapy to lower LDL < 900nmol/L. Patients with CHD or CHD equivalents are recommended to begin LDL-lowering drug therapy to LDL < 700nmol/L. All patients with LDL particle numbers greate than 1100 mnol/I are recommended to be treated aggressively.	12	High VLDL Particle Number (VLDL > 85 nmol/L): No reported clinical guidance by NCEP, however this correlates to triglyceride						
Elevated Remnant Lipoprotein Particle Number (RLP > 150 nmol/L): This new NCEP risk factor has been shown to be highly correlated with CHD and should be monitored along with other risk factors during lifestyle, supplement and/or drug treatment. Omegafatty acids have been shown to reduce triglycerides and RLP. Borderline to High LDL III Particle Number (LDL III>300 nmol/L): Indicates an abundance of small-dense atherogenic LDL-particles. Management should be considered depending on LDL-C goals and risk factors. Reducing LDL-C and TG often will lower dense LDL particles. Elevated LDL IV (LDL IV> IUU nmol/L): Indicated abundance of very small-dense atherogenic particles. Lp(a) is found typically between del .05 and del .08 and often is located in the range for LDL IV. Treatment for high LDL IV and Lp(a) are very similar, typic miacin and aggressive LDL-C reduction. Low HDL particle count < 7000 nmol/L, 7000 - 8000 nmol/L is Borderline for Males and Low for Females: Indicates potential atherogenic dyslipidemia. Beneficial therapies similar to those which raise HDL-C and reducing elevated TG (diet, exercise, miacin, one; 3's) Risk Factor for HDL2b between 1500 and 1750 nmol/L is borderline for males and risk factor for females. Values less the 1500 is a risk factor for males: Indicates that the HDL reverse transport system is not working well to remove excess cholesterol. Non-HDL Particle Numbers: Non-HDL particle numbers is the best overall indicator of CVD risk. Optimal: <800 nmol/L Borderline Risk: 800-1000 nmol/L High Risk: > 1000 nmol/L ApoB: A measure of all non-HDL particle numbers. Optimal: <80 mg/dL Rowlerline Risk: 80-100 mg/dL High Risk: > 100 mg/dL ApoB: A measure of all non-HDL particle numbers.	13	recommended to initiate therapeutic lifestyle of equivalents are recommended to begin LDL-lo	changes and/or drug therapy to lower LDL < 900; wering drug therapy to LDL <700;nmol/L. All pa	nmol/L. Patients with CHD or CHD				
particles. Management should be considered depending on LDL-C goals and risk factors. Reducing LDL-C and TG often will lower dense LDL particles. Elevated LDL IV (LDL IV> 100 nmol/L): Inducated abundance of very small-dense atherogenic particles. Lp(a) is found typically between d=1.05 and d=1.08 and often is located in the range for LDL IV. Treatment for high LDL IV and Lp(a) are very similar, typic niacin and aggressive LDL-C reduction. Low HDL particle count < 7000 nmol/L, 7000 - 8000 nmol/L is Borderline for Males and Low for Females: Indicates potential atherogenic dyslipidemia. Beneficial therapies similar to those which raise HDL-C and reducing elevated TG (diet, exercise, niacin, omega's) Risk Factor for HDL2b between 1500 and 1750 nmol/L is borderline for males and risk factor for females. Values less that 1500 is a risk factor for males: Indicates that the HDL reverse transport system is not working well to remove excess cholesterol. Non-HDL Particle Numbers: Non-HDL particle numbers is the best overall indicator of CVD risk. Optimal: <800 nmol/L Borderline Risk: 800-1000 nmol/L High Risk: >1000 nmol/L	14	Elevated Remnant Lipoprote in Particle Number (RLP > 150 nmo I/L): This new NCEP risk factor has been shown to be highly correlated with CHD and should be monitored along with other risk factors during lifestyle, supplement and/or drug treatment. Omega-3						
between d=1.05 and d=1.08 and often is located in the range for LDL IV. Treatment for high LDL IV and Lp(a) are very similar, typic niacin and aggressive LDL-C reduction. Low HDL particle count <7000 nmol/L, 7000 - 8000 nmol/L is Borderline for Males and Low for Females: Indicates potential atherogenic dyslipidemia. Beneficial therapies similar to those which raise HDL-C and reducing elevated TG (diet, exercise, niacin, omega's) Risk Factor for HDL2b between 1500 and 1750 nmol/L is borderline for males and risk factor for females. Values less that 1500 is a risk factor for males: Indicates that the HDL reverse transport system is not working well to remove excess cholesterol. Non-HDL Particle Numbers: Non-HDL particle numbers is the best overall indicator of CVD risk. Optimal: <800 nmol/L Borderline Risk: 800-1000 nmol/L High Risk: >1000 mmol/L High Risk	15	particles. Management should be considered de		30.				
atherogenic dyslipidemia. Beneficial therapies similar to those which raise HDL-C and reducing elevated TG (diet, exercise, niacin, omega's) Risk Factor for HDL2b between 1500 and 1750 nmol/L is borderline for males and risk factor for females. Values less the 1500 is a risk factor for males: Indicates that the HDL reverse transport system is not working well to remove excess cholesterol. Non-HDL Particle Numbers: Non-HDL particle numbers is the best overall indicator of CVD risk. Optimal: <800 nmol/L Borderline Risk: 800-1000 nmol/L High Risk: >1000 nmol/L ApoB: A measure of all non-HDL particle numbers. Optimal: <80 mg/dL Borderline Risk: 80-1000 mg/dL High Risk: >1000 mg/dL	16	Elevated LDL IV (LDL IV> 100 nmoVL): Indicated abundance of very small-dense atherogenic particles. Lp(a) is found typically between d=1.05 and d=1.08 and often is located in the range for LDL IV. Treatment for high LDL IV and Lp(a) are very similar, typically						
1500 is a risk factor for males: Indicates that the HDL reverse transport system is not working well to remove excess cholesterol. Non-HDL Particle Numbers: Non-HDL particle numbers is the best overall indicator of CVD risk. Optimal: <800 nmol/L Borderline Risk: 800-1000 nmol/L High Risk: >1000 nmol/L	17	Low HDL particle count < 7000 nmol/L, 7000 - 8000 nmol/L is Borderline for Males and Low for Females: Indicates potential atherogenic dyslipidemia. Beneficial therapies similar to those which raise HDL-C and reducing elevated TG (diet, exercise, macin, omeg						
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Optimal: <800 nmol/L Borderline Risk: 800-1000 nmol/L High Risk: >1000 nmol/L ApoB: A measure of all non-HDL particle numbers. 20 Optimal: <80 mg/dL Borderline Risk: 80-100 mg/dL High Risk: >100 mg/dL High Risk: >100 mg/dL	19	Non-HDL Particle Numbers: Non-HDL particle numbers is the best overall indicator of CVD risk.						
20 Optimal: <80 mg/dL Borderline Risk: 80-100 mg/dL High Risk: >100 mg/dL		Optimal: <800 nmol/L	Borderline Risk : 800-1000 nmol/L	High Risk: >1000 nmol/L				
Boyderline Risk: 80-100 meldI. High Risk: >100 meldI.		ApoB: A measure of all non-HDL particle numbers.						
	20		Borderline Risk: 80-100 mg/dL	High Risk: >100 mg/dL				