

# Statin, Aspirin, and CV Prevention

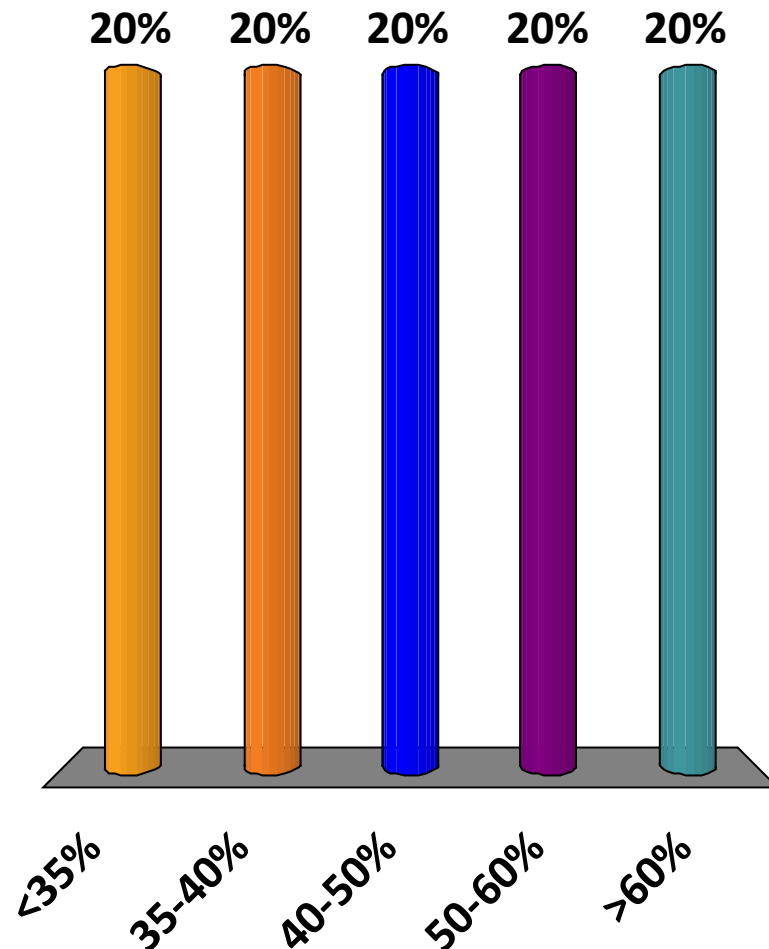
J. Brian Bronson, MD

Physician Director Outpatient Quality San Diego  
Chief of Family Medicine



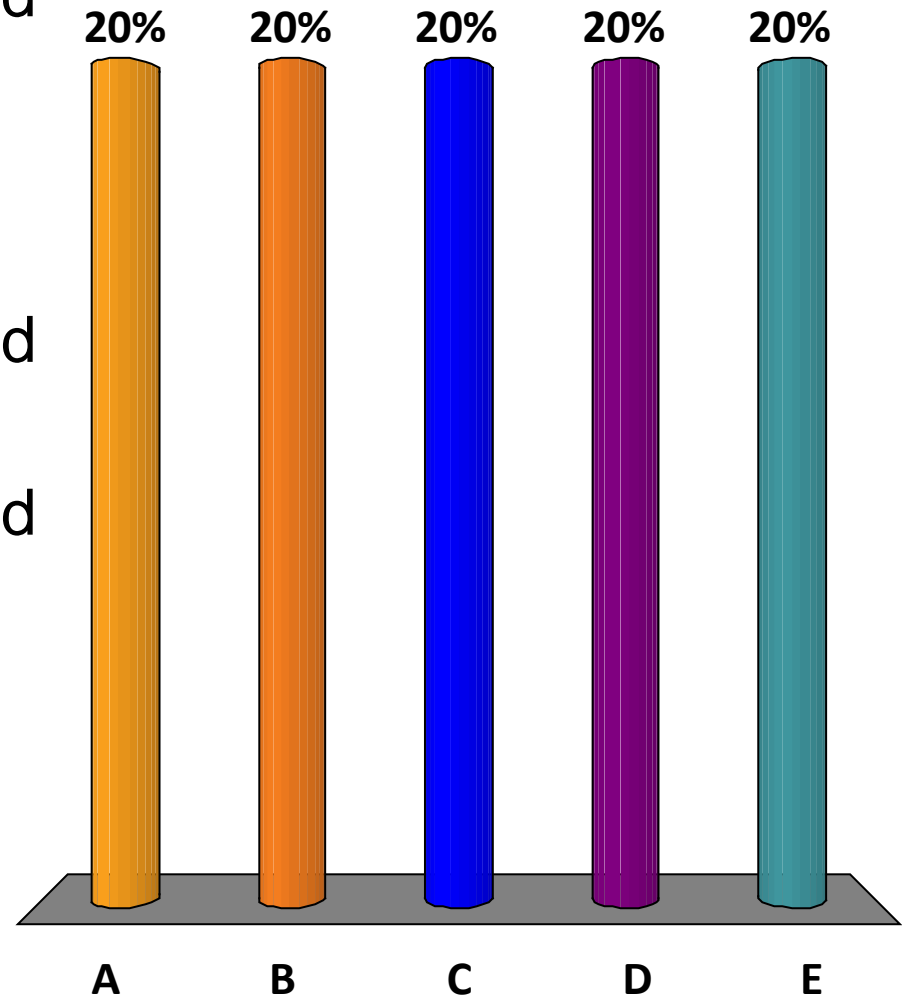
# Approximately how much risk reduction from MI can a patient receive by using Atorvastatin 40mg + aspirin 81mg?

- A. <35%
- B. 35-40%
- C. 40-50%
- D. 50-60%
- E. >60%



# A 61 year old Male with DM and ASCVD risk of 9%. You should:

- A. Start Atorvastatin 40mg and Aspirin 81mg
- B. Discuss Atorvastatin 20mg and Aspirin 81mg
- C. Start Atorvastatin 40mg and discuss Aspirin 81mg
- D. Start Atorvastatin 20mg and do not start aspirin
- E. Discuss Atorvastatin 40mg and do not start Aspirin.

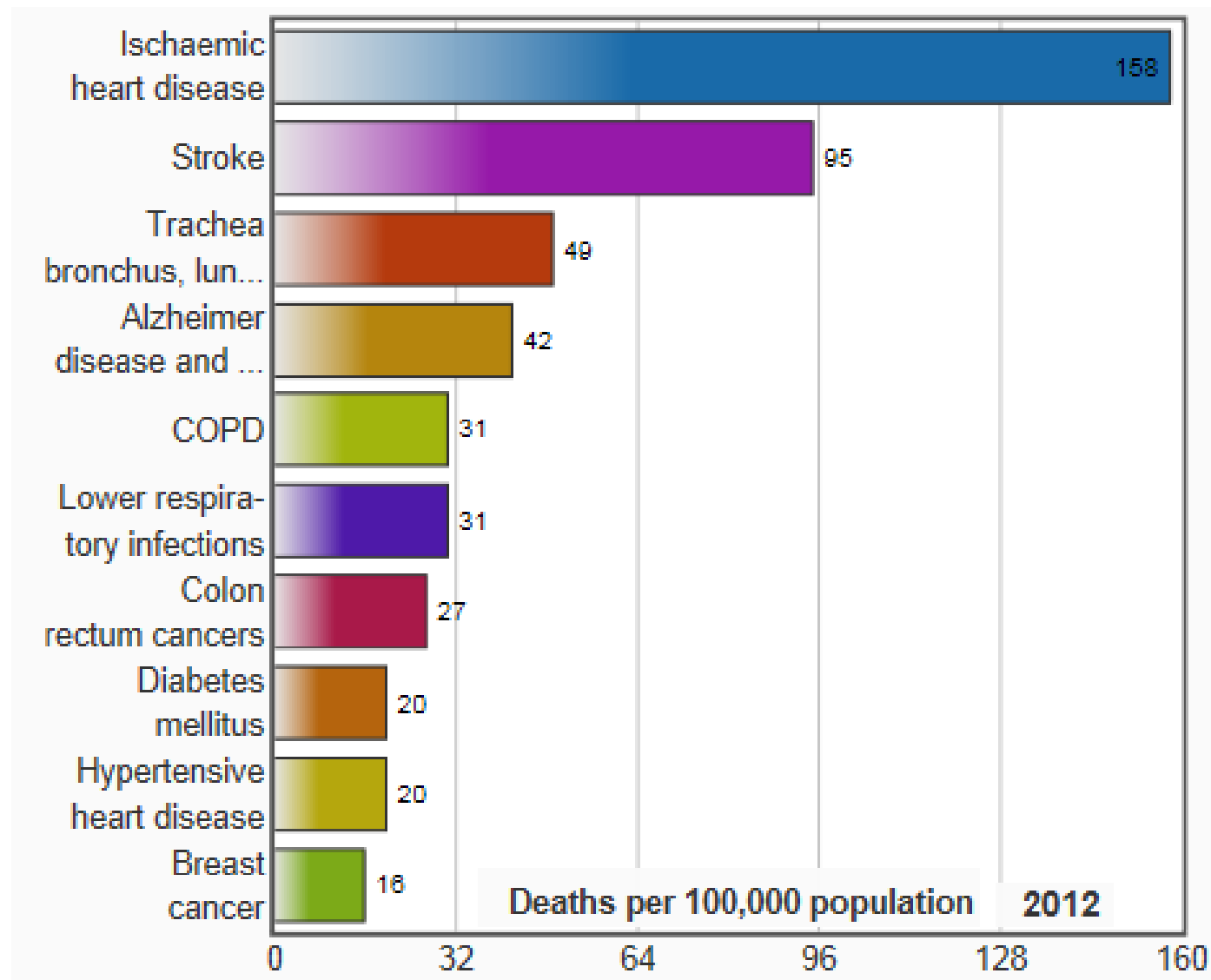


# Statins, Aspirin, and CV Prevention



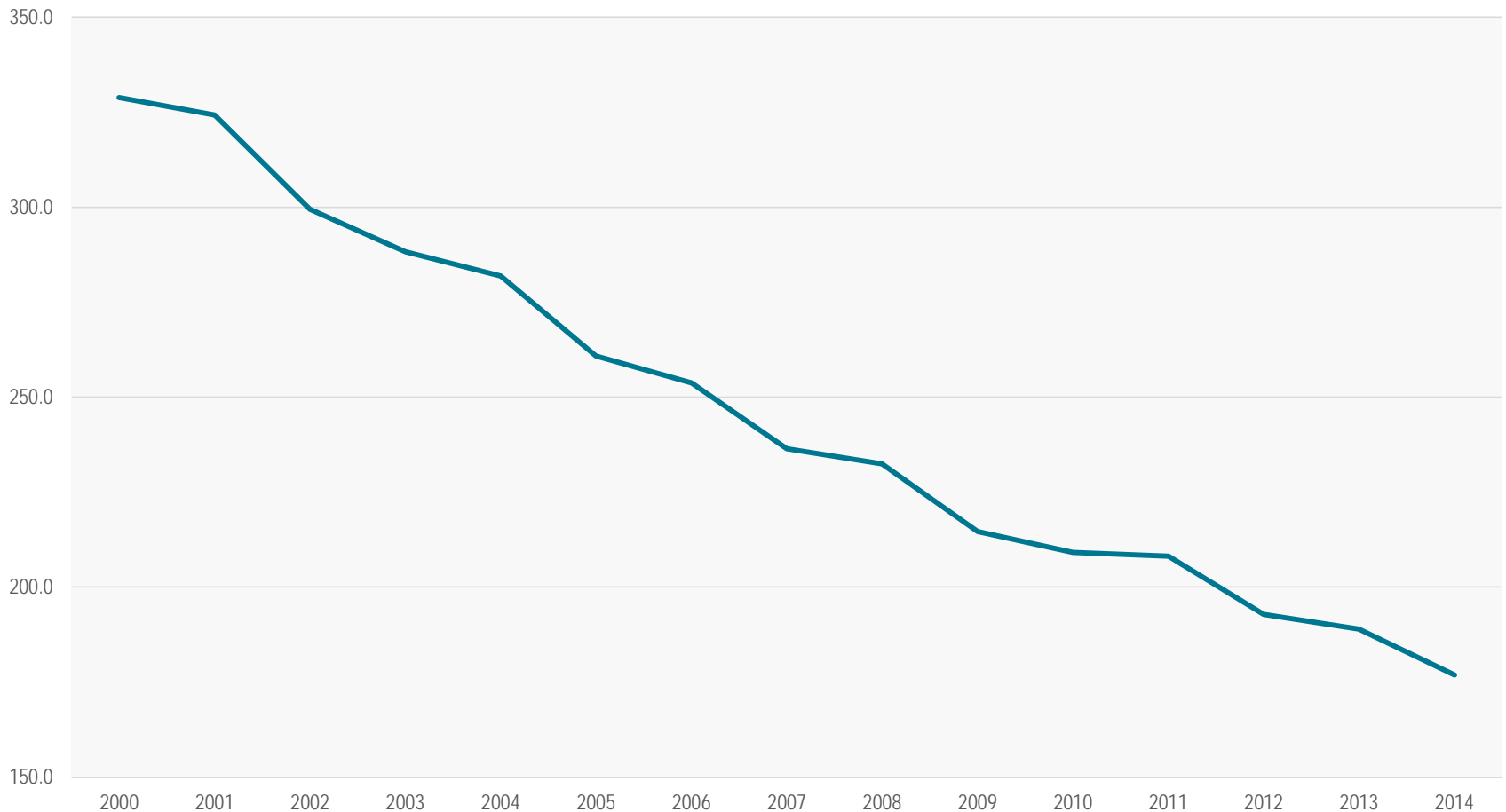
- Heart attacks and strokes are big drivers of death and disability in the US and in KP.
- Leveraging KP integrated systems for statin and aspirin optimization provides opportunity for reduction in ASCVD events and associated costs.

# Top 10 causes of death in high income countries



# KP SCAL MI trend

overall 2010 US Census age standardized Myocardial Infarction incidence rate per 100,000 py at KP SCAL



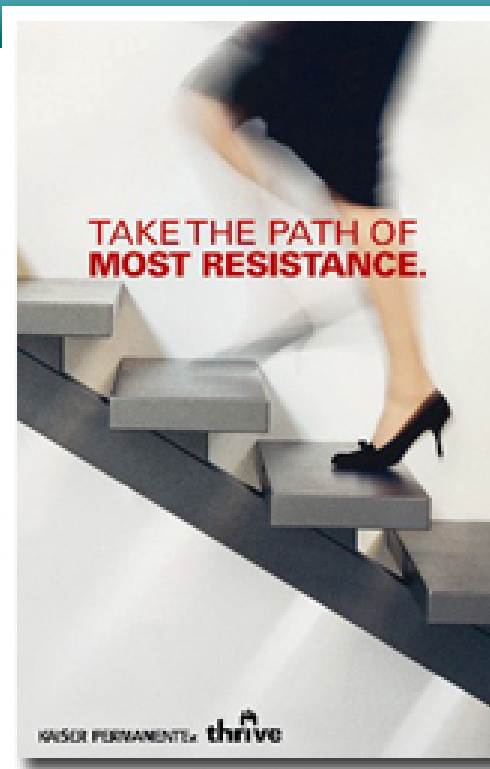
# The KP San Diego Journey



- ALL program - 2000
  - Aspirin
  - Lisinopril
  - Lovastatin → Simvastatin → Atorvastatin
- Started with PC Education from Jim Dudl
- Tear off sheet Rx with all 3 meds prewritten.

# Lifestyle Promotion

- Promote exercise
  - Motivational Interviewing
    - Work in Progress
- Healthy Plate Promotion
  - Quick, impactful intervention
  - Picture helps overcome literacy barriers.
  - Training for all SD Primary Care physicians





# Updated Four Statin Benefit Groups

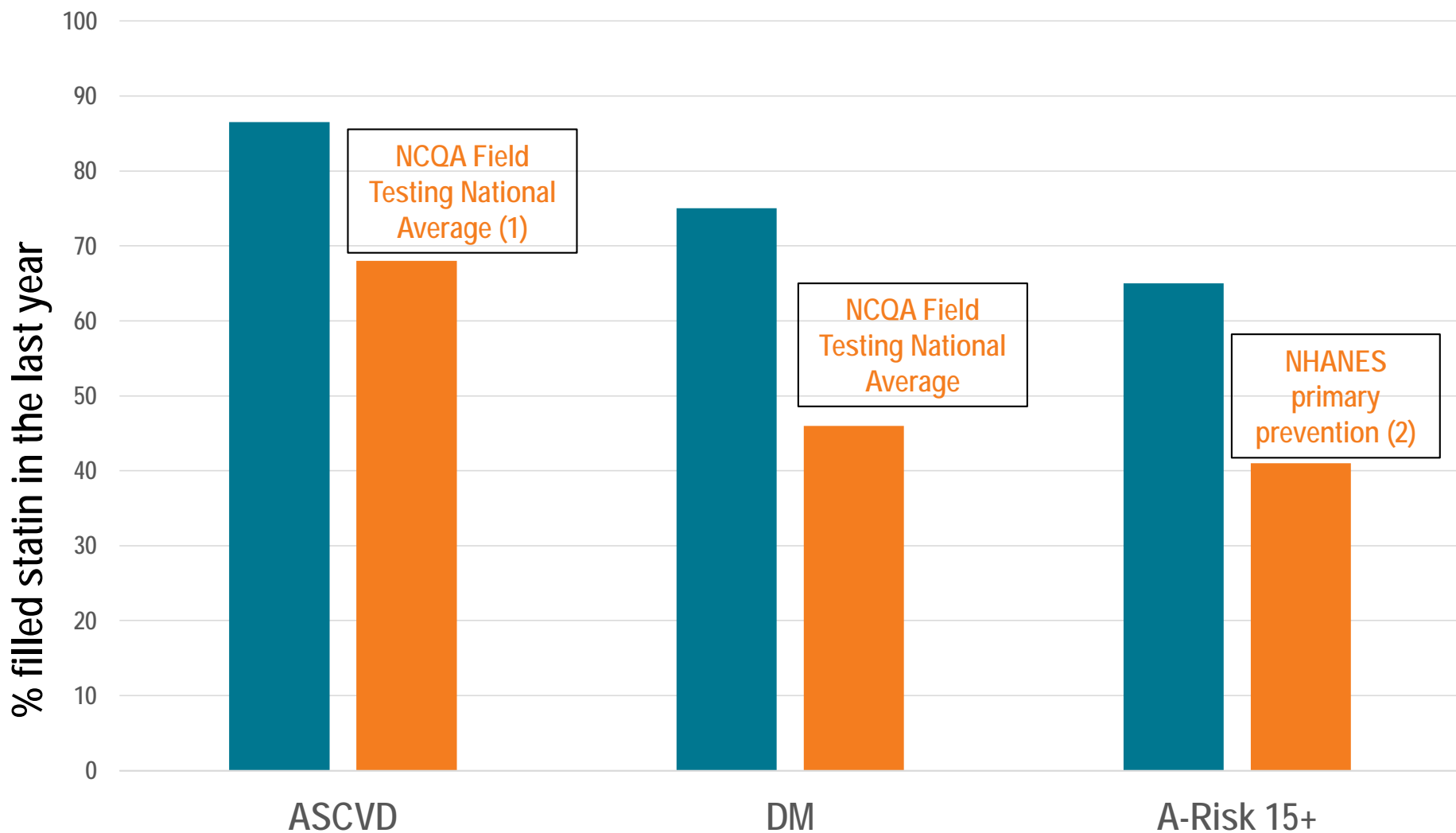
1. **Clinical ASCVD**, start atorvastatin 40-80 mg
2. **LDL  $\geq$  190**, start atorvastatin 40-80 mg
3. **DM age 40-75**,

A-Risk	ARR	recommendation
$\geq 7.5$	$\geq 3$	Start atorvastatin 40 mg
$< 7.5$	$< 3$	Start atorvastatin 20 mg

4. **“4<sup>th</sup> Statin Benefit Group”**,

A-Risk	ARR	recommendation
$\geq 15$	$\geq 4$	Start atorvastatin 40 mg
7.5 - 14.9	3 - 3.9	Discuss atorvastatin 40 mg
5 - 7.4	2 - 2.9	Consider atorvastatin 20 mg

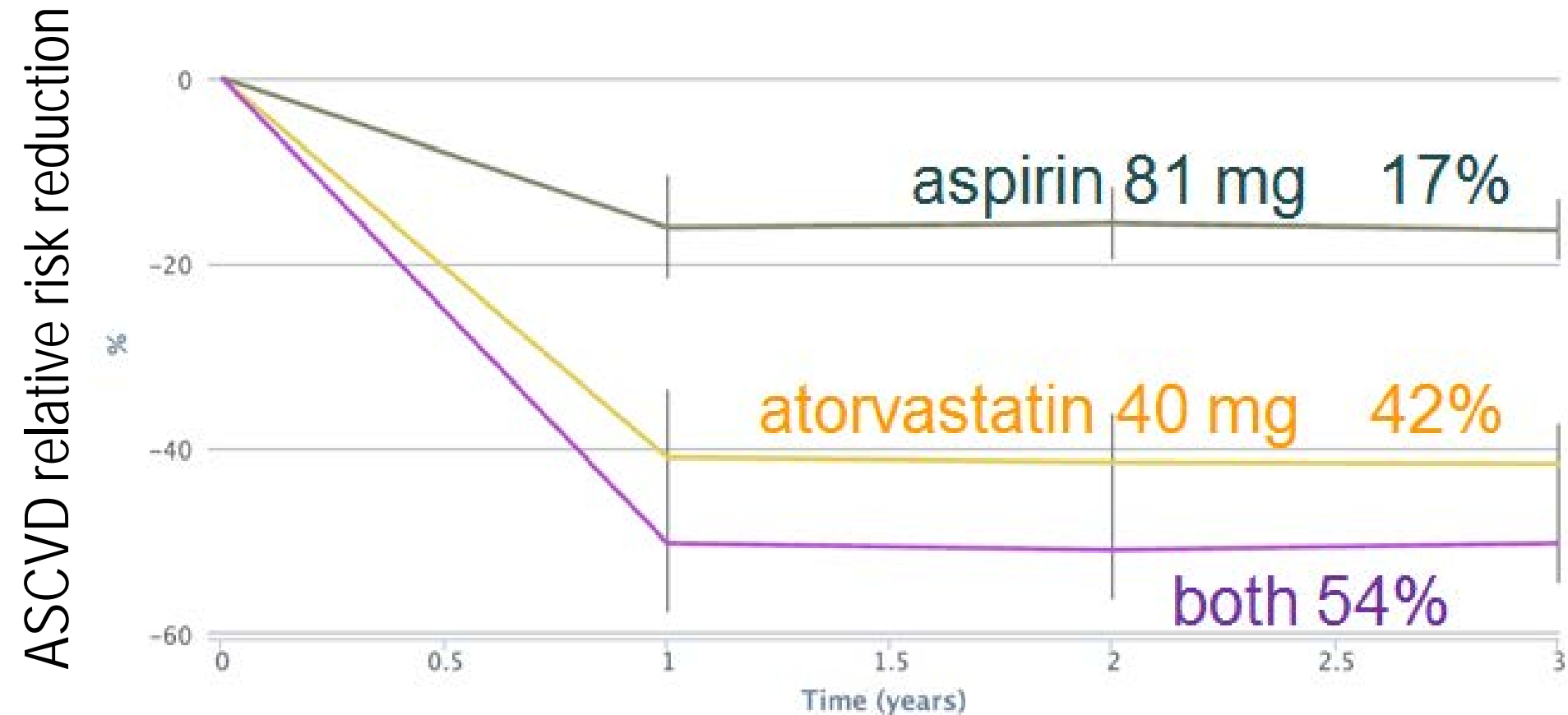
# Statins KPSC as of Oct 2016



1. NCOA Testing 4/9/15

2. Pencina et al. *N Engl J Med* 2014;370:1422-31.

# Modeled Statin and Aspirin Risk Reduction, Primary Prevention. Archimedes ARChES



# Aspirin to help prevent MI, stroke and Colorectal Cancer!

For adults without ASCVD, with or without diabetes mellitus:

- Age 50-59 with A-Risk  $\geq 10\%$ , **start aspirin 81 mg daily**.
  - About 30% of men and 2% of women in NHANES qualify.
- Age 60-69 with A-Risk  $\geq 10\%$ , **discuss aspirin 81 mg daily**.
  - 82% men and 30% of women in NHANES qualify.

# Lifetime events in 1,000 women taking aspirin

## - primary prevention

ASCVD Risk	MIs Prevented	Ischemic Strokes Prevented	CRC Cases Prevented	Serious GI Bleeding Caused	Hemorrhagic Strokes Caused	Net Life-Years Gained	Quality-Adjusted Life-Years Gained
Ages 50 to 59 years		<b>A-Risk<sub>≥</sub>10% → Start aspirin 81 mg daily</b>					
10%	14.8	13.7	13.9	20.9	3.5	21.9	62.1
15%	15.0	14.3	13.5	20.0	3.4	33.4	71.6
20%	15.2	14.4	13.2	18.4	2.9	46.3	83.3
Ages 60 to 69 years		<b>A-Risk<sub>≥</sub>10% → Discuss aspirin 81 mg daily</b>					
10%	10.1	11.6	10.5	23.0	3.2	-1.2	28.4
15%	11.0	12.9	9.3	21.6	3.4	1.7	32.4
20%	11.1	13.0	9.7	21.7	3.3	4.8	36.0

# Promote Statin + Aspirin use and adherence

- Use opportunities:
  - When new diagnosis, (MI, PAD, Diabetes).
  - When communicating lipid panel results (and A-Risk).
- Majority of non-adherent feel “Medicine will do more harm than good”. Explain risk of disease, benefit of treatment.
- Discuss potential barriers to adherence.
- Pillbox “gift” to promote adherence.



# Just In Time Information for the Health Care Team



- Primary Encounter Checklist
- Specialty Encounter Checklist
- Oncology Encounter Checklist
- Regional Outreach
- SPPM Checklist
- CMSS
- KP.ORG PAP

## Encounter Checklist

[Print](#)  
 [Print KP.ORG PAP \(Spanish\)](#)  
 [Print KP.ORG PAP](#)

Generated on: 11/7/2016

Name	MRN	Age	DOB	
PCP BRONSON, JOHN BRIAN (M.D.)	Gender M	Day Phone (000) 000-0000	Evening Phone	
oPAP Last viewed	30 Oct 2016 9:44 PM	<input type="button" value="SHOW CDCF"/> <input type="button" value="SHOW CMSS"/>		
Address	Cell No			
Language ENGLISH	Last Advance Directive Date N/A	Last POLST Date N/A		
ASCVD Risk Score 24.30%				
Asthma Medication Ratio	N/A			

### Care Gaps

- Missing Current Exercise Vitals
- Update BMI - Take Height AND Weight
- Update Tobacco Use

### Recommendations

Care Gaps Due	Actions to Be Taken
Missing Current Exercise Vitals	<ul style="list-style-type: none"> <li>• Document exercise vitals in exercise vitals section</li> </ul>
Update BMI - Take Height AND Weight	<ul style="list-style-type: none"> <li>• Update Height AND Weight</li> </ul>
Update Tobacco Use	<ul style="list-style-type: none"> <li>• Verify and update tobacco use status</li> <li>• Stage tobacco counseling v-code and patient instructions</li> </ul>

# Just In Time Advice for the Health Care Team



Primary Encounter Checklist	Specialty Encounter Checklist	GYN Encounter Checklist	Oncology Encounter Checklist	Regional Outreach	SPPM Checklist	CMSS
-----------------------------	-------------------------------	-------------------------	------------------------------	-------------------	----------------	------

Care Management Summary Sheet (CMSS) [Review Date 12/22/14](#) [Re-Review Date](#) [Print](#)

Patient: [REDACTED] Gender: F  
 PCP: MATISTA, JOSEPH PAUL (M.D.) PCP Apt: 10/14/2016 Phone: (000) 000-0000 Language: SPANISH  
 Last BP: 1)10/25/16 (132/64) 2)08/28/16 (133/68) Last MAM: 02/17/2016 Last PAP: 05/23/2016  
 ASCVD Risk Score: 5.5%

### Recommended Care

- Start lisinopril (target 10 - 40mg daily).
- DM Age 40-75 AND A-Risk < 7.5%: Start atorvastatin 20mg daily.
- DIABETES: Glucose Rx not optimal/check compliance.
- Discuss aspirin 81mg daily - benefit outweighs risk.

### Diseases / Risks

DM	HTN	ASCVD Risk Score
	CTL	5.5%

### Last two lab results

Date	Type	Result	Source
08/06/16	A1C	12.2	K
12/23/14	ALT	97	K
08/06/16	CR	0.49	K
08/06/16	GFR	>89	K
07/29/15	GFR	>89	K
12/07/07	HepBsAg	NEGATIVE	K
05/22/03	HepBsAg	NON REACTIVE	K

### All Current Active Meds List

Date	Drug	Mrar %	Dsr	Qty	Fill
11/03/16	(O)ATORVASTATIN 20 MG ORAL TAB				
08/28/16	(S)GLIPIZIDE 10 MG ORAL TAB	68	32	200	13





# Timely Med Adherence Information

## Care Management Summary Sheet (CMSS) [Review Date](#) [Re-Review Date](#) [Print](#)

Patient: [REDACTED]  
 PCP: BRONSON, JOHN BRIAN (M.D.)    PCP Apt: 09/26/2016    Phone: (000) 000-0000    Language: ENGLISH  
 Last BP: 1)10/06/16 (119/57)    2)09/26/16 (87/54)    Last MAM:    Last PAP:  
**ASCVD Risk Score: 24.3%**

### Recommended Care

- Verify and update tobacco status. Stage tobacco counseling V code and patient instructions

### Diseases / Risks      Last two lab results

Diseases / Risks	Date	Type	Result	Source
ASCVD Risk Score				
HTN	08/10/16	A1C	6.5	K
CTL	08/10/16	ALBUMIN	3.7	K
	05/04/16	ALBUMIN	3.9	K
	05/04/16	ALT	31	K
	09/03/15	ALT	31	K
	08/10/16	CR	1.43	K
	05/04/16	CR	1.22	K
	08/10/16	GFR	49	K
	05/04/16	GFR	59	K
	08/10/16	HCO3	28	K
	05/04/16	HCO3	32	K

### All Current Active Meds List

Date	Drug	Mrar %	Dsr	Qty	F
11/04/16	(S)HYDROCODONE-ACETAMINOPHEN 5-325 MG ORAL TAB			20	
11/03/16	(O)PEG 3350-ELECTROLYTES 240-22.72-6.72 -5.84 GRAM ORAL RECON SOLN			4000	
11/01/16	(S)PREDNISONE 10 MG ORAL TAB			30	
10/18/16	(S)LEVOthyroxine 137 MCG ORAL TAB	98	83	100	
09/26/16	(S)CIPROFLOXACIN HCL 500 MG ORAL TAB			10	
09/26/16	(S)METRONIDAZOLE 500 MG ORAL TAB			30	
09/13/16	(O)GAVILYTE-C 240-22.72-6.72 -5.84 GRAM ORAL RECON SOLN				
08/27/16	(S)ANUCORT-HC 25 MG RECT SUPP			24	
08/24/16	(S)ATORVASTATIN 40 MG ORAL TAB	100	18	90	
08/24/16	(O)ASPIRIN 81 MG ORAL TBEC DR TAB				

Date	CHOL	TRG	HDL	LDL
08/10/16	183	182	37	110
12/09/13	204		43	137

### Last 4 Hosp/ER Visits 12 mo

Date	Type

### Asthma

# Engaging the Patient in Their Care

## Personal Action Plan

[Spanish](#) [Print](#)

The information being provided may be between 24 and 48 hours old. Some or all of the care gaps may have been completed during the current visit.

Generated on 11/07/2016

Name:	[REDACTED]	Primary Care Provider:	John Brian Bronson, M.D.
MRN:	[REDACTED]	Age:	[REDACTED]
Date of birth:	[REDACTED]	Gender:	Male

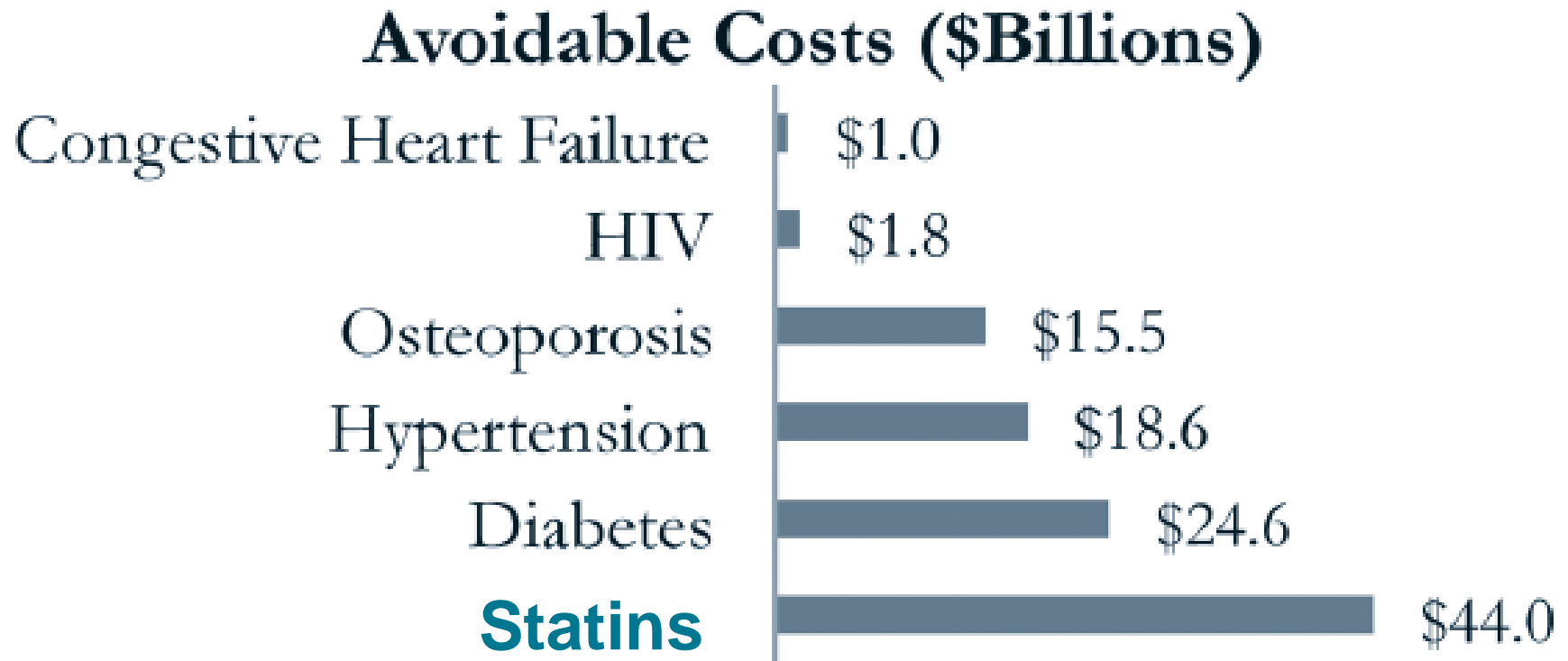
### Cancer screening

Health topic	Details	
Colorectal cancer screening	<b>Current status</b> Up to date  <b>Action to be taken</b> Good job! No Action needed.	<b>Due date</b> 06/05/2022

### Heart health

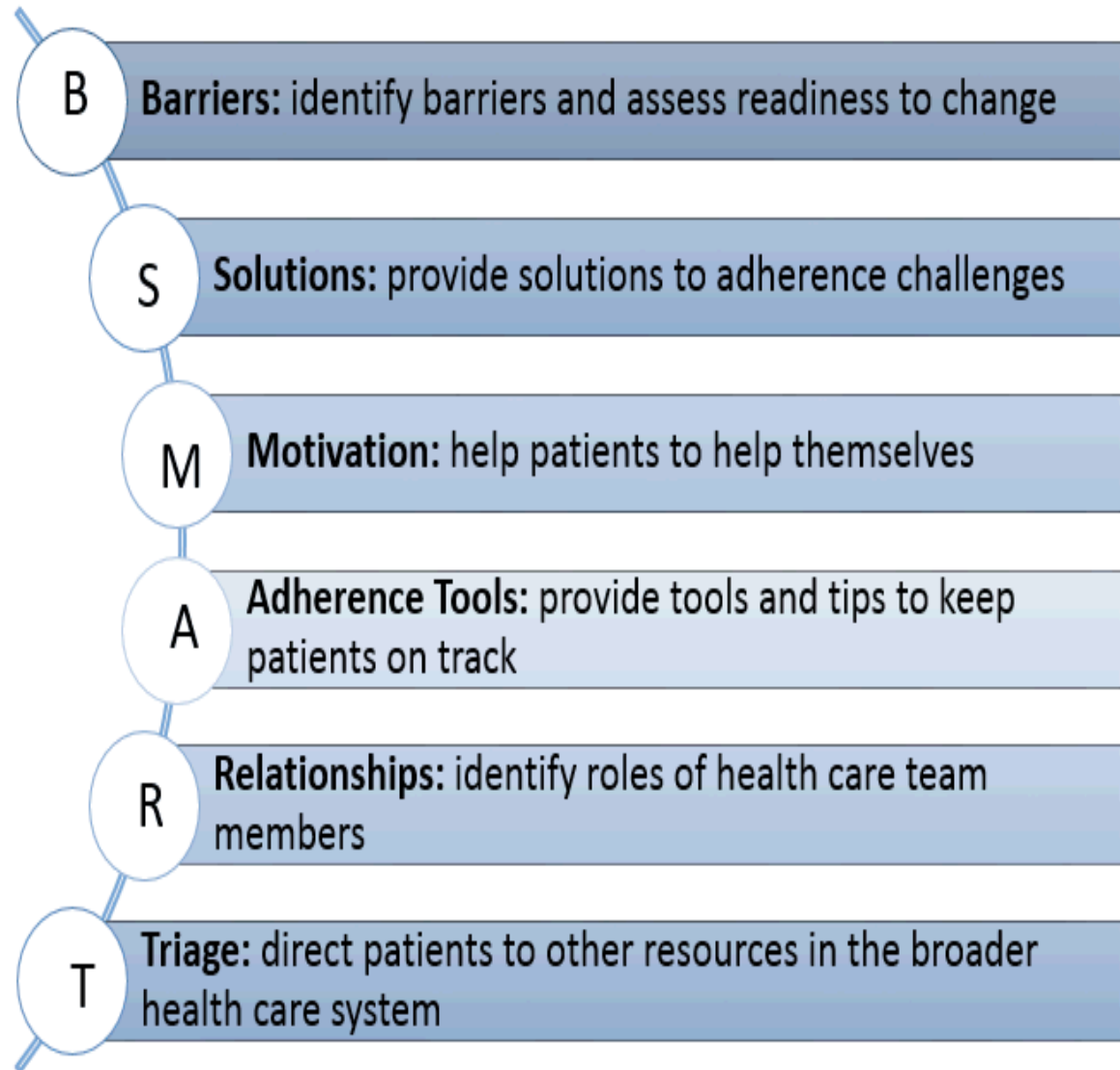
Health topic	Details	
Heart/stroke risk	<b>Heart/stroke risk</b> 24.3%  <b>Action to be taken</b> Discuss how to best reduce your risk with your provider.	<b>Status</b> Elevated  <b>Additional information</b> You have the following personal risk factors, you should discuss how to reduce these risks with your provider: <ul style="list-style-type: none"> <li>Quit smoking</li> <li>Lower your cholesterol</li> <li>Exercise and follow a healthy lifestyle to lower risk (also lowers blood pressure and cholesterol)</li> </ul> <p>To find out more information on ways to reduce your heart attack/stroke risk, log onto your full Personal Action Plan at <a href="http://kp.org/actionplan">kp.org/actionplan</a>.</p>

# Avoidable Health Care Costs with Better Medication Adherence



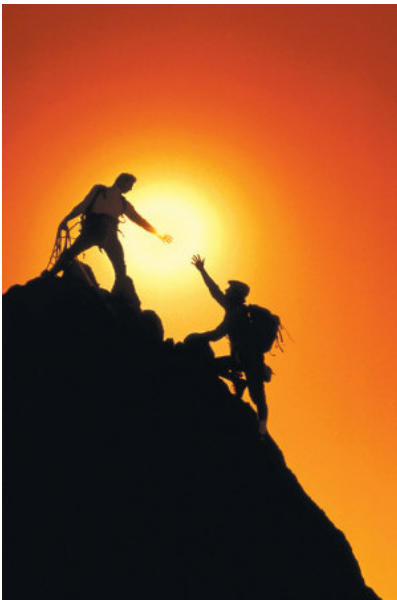
# Engaging the Pharmacist to help with Medication Adherence

- KPSC outpatient pharmacists do targeted CV med adherence consultations in pharmacies.



# It's an Ongoing Journey Together

- We've made strides in the right direction.
- KP partners with Be There San Diego to improve the health and well being of all San Diegans.
- As studies show new benefits, we must continue to push the changes forward for our patient's benefit.



Vs.

