Daily Experiences of Direct Contact and Media Contact

by

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A thesis submitted in conformity with the requirements
for the degree of Master of Arts
Department of Psychology
University of Toronto

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Abstract

The present research examined how daily experiences of intergroup contact through social interaction (direct contact) and exposure to outgroups in media (media contact) facilitate improvements in intergroup attitudes. A longitudinal diary study was conducted whereby participants indicated the amount of direct contact and media contact they had each day, as well as their intergroup attitudes. Results indicated that direct contact and media contact both independently predicted improvements in intergroup attitudes. For direct contact, but not media contact, this relationship was moderated by the perceived negativity of the contact. Time-lagged analyses indicated that direct contact on a given day predicted improved intergroup attitudes on a subsequent day above and beyond direct contact on that day, but that media contact has little or no residual impact. This suggests that although media contact and direct contact may both be effective at promoting more positive intergroup attitudes, direct contact may have a more lasting impact.
Acknowledgments

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Chapter 1

Introduction

The idea that intergroup contact may reduce prejudice and promote intergroup harmony was first popularized by Gordon Allport (1954) in his book, *The Nature of Prejudice*, over half a century ago. Since then, a breadth of studies have attempted to illuminate if, how, and when intergroup contact is successful at promoting positive intergroup attitudes. The findings of this research, while nuanced, suggest that intergroup contact improves intergroup attitudes on the whole (Pettigrew & Tropp, 2006). Specifically, contact with one member of a social outgroup can lead to improved attitudes towards the entire group (Brown, Vivian & Hewstone, 1999; Miller, Brewer, & Edwards, 1985; Voci & Hewstone, 2003), and improved attitudes towards a particular social outgroup can lead to improved attitudes towards a variety of social outgroups (Eller & Abrams, 2004; Pettigrew, 1997; Pettigrew, 2009). These findings demonstrate the power that intergroup contact holds for improving intergroup relations and paving the path towards peaceful, egalitarian societies.

Intergroup contact has typically been defined as face-to-face interaction with outgroup members. This may be referred to as direct contact because it requires direct social interaction. However, there are other, indirect forms of contact that people experience every day. For instance, although a person may have minimal direct contact with outgroup members, they may have friends and family members that have close relationship with outgroup members. Their awareness of these relationships may
facilitate an improvement in intergroup attitudes, without them having actually had much, if any, direct contact with this group (Wright, Aron, McLaughlin-Volpe, & Ropp, 1997; Eller, Abrams, & Zimmerman, 2011; Turner, Hewstone, Voci, & Vonofakou, 2008). Similarly, intergroup contact could take the form of interacting with an outgroup member via a particular medium (“parasocial contact”; Horton & Wohl, 1957; Schippa, Gregg & Hewes, 2005; 2006) or watching, reading, or hearing about an interaction between an ingroup member and outgroup member (“vicarious contact”; Gomez & Huici, 2008; Joyce & Harwood, 2012; Mazziotta, Mummendey, & Wright, 2011). These forms of contact are readily experienced via exposure to mass media. Importantly, media is ubiquitous with the average Canadian and American adult spending 32 hours watching television each week (Television Bureau of Canada, 2013) and 42 hours surfing the internet each month (comScore.com, 2013). As such, contact with outgroup members via media has the potential to influence a wide-range of people on a daily bases.

1.1 Intergroup Contact Through Mass Media

I propose that the scope of intergroup contact theory can be further expanded to include intergroup contact through mass media, termed *media contact*. Media contact is contact that is (1) experienced vicariously, by watching/reading or hearing about an ingroup member interacting with an outgroup member, or parasocially, by feeling as through you are interacting with an outgroup member that you observe in a particular media source, and (2) distributed to individuals *en masse* through broadcasting, print, or digital communication. Contact through mass media may operate analogously to direct social
interaction and may predict intergroup attitudes and behaviour.

Media contact may be experienced through both parasocial interaction and vicarious interaction with media characters. Schippa, Gregg, and Hewes (2005) examined parasocial media contact across four studies. They expected that contact with media characters that belong to distinct social outgroups could activate interpersonal processes similar to those activated during direct contact. For the purposes of their research, they wanted to determine whether exposure to television series that included Lesbian/Gay/Bisexual/Transgender (LGBT) characters would influence attitudes towards their group. In each study, participants watched a varying number of episodes of the television series (i.e., 10, 3, and 1 episode(s)) that included characters that identified as LGBT. They found across all three studies that straight participants that were exposed to these television series demonstrated improved LGBT attitudes. Building off this work, Oritz and Harwood (2007) examined whether participants self-reported prior exposure to television series with LGBT or Black characters would improve attitudes towards these outgroups for straight and White participants, respectively. However, they viewed this from a vicarious interaction perspective. They suggested that participants' intergroup attitudes would improve because of their identification with the ingroup characters involved in the interaction, as those ingroup characters would serve as social models demonstrating that intergroup contact could be a positive experience. In line with their primary hypothesis, participants that reported greater viewing of each television series demonstrated more positive attitudes towards each outgroup. Taken together these studies suggests media contact, overall, may have great promise for improving
intergroup attitudes.

An important feature of media contact as we have defined it is that it is focused on mass media. Mass media may be streamed through a variety of mediums to the general public. Even though research on media contact has tended to focus on visual media, exposure to outgroups and intergroup relations via audio and print media may foster similar improvements in intergroup attitudes. Indeed, a field study conducted in Rwanda demonstrated that repeated exposure to a radio soap opera portraying relatively positive relations between two conflicting groups in Rwanda (Hutus and Tutsis) promoted the endorsement of positive social norms and behaviours between the two groups (Levy-Paluck, 2007). Moreover, exposure to written narratives describing friendship between members of different ethnic groups has been found to improve intergroup attitudes (Cameron & Rutland, 2006; Cameron, Rutland, Brown, & Douch, 2006). This suggests that media contact may occur across multiple mediums, facilitating similar improvements in intergroup attitudes as to what has been found with visual media. As such, we view media contact as an aggregate of exposure to the variety different mediums (radio, television, print, and internet) that are available to the public.

### 1.2 Comparing Media Contact and Direct Contact

Media contact overcomes two important barriers to direct contact. First, media's ubiquity allows it to be accessed by a wide range of people, including people that have little opportunity for direct interaction with outgroups. Although North American cities are becoming increasingly diverse, a
number of them still have small minority populations. Furthermore, although ethnic segregation has decreased across most of the United States, it still persists in some regions (Glaeser, & Vigdor, 2001). It is likely that individuals living in these regions will have limited opportunity for direct intergroup interaction. Second, similar to other forms of indirect contact, (i.e. Imagined Contact; Turner, Crisp, Lambert, 2007; Extended Contact; Wright et al., 1997), media contact may be able to circumvent the anxiety that is often experienced during direct contact. Direct social interactions, whether intra-or intergroup, can be anxiety-provoking experiences. That is, if a person believes they are not capable of conveying a desired impression during an interaction, then they may have negative expectations regarding the outcome of the interaction which, in turn, may lead to anxiety (Schlenker & Leary, 1982). Importantly, these feelings tend to be amplified during an intergroup interaction (Plant & Devine, 2003; Stephan & Stephan, 1985; Vorauer, 2006). However, as the observer in an interaction experienced via media is not an active participant in the interaction, there is little reason for them to be concerned about how they are acting or how they are being perceived. This may allow individuals who are prone to anxiety during intergroup interaction to reap the benefits of intergroup contact without suffering from the anxiety that can occur with direct contact.

Given that media contact is not impeded by the anxiety that may pervade direct contact and that media is a rather salient aspect of our daily lives, it may be a particularly important means by which to attenuate prejudice and promote more positive intergroup relations at the societal level. Moreover, even when direct contact is possible, because of media's ubiquity it is likely that media
contact occurs parallel to direct contact. However, research has yet to examine these two forms of contact in tandem to determine their dynamic influence on intergroup attitudes.

Some research has examined participants' prior levels of direct contact to see how this influences the relationship between media contact and intergroup attitudes. It appears that media contact may have the greatest impact on attitudes when direct contact is lacking (Fujioka, 1999; Schippa et al., 2005). This makes sense given that direct contact improves intergroup attitudes and as such those that have had direct contact should have positive intergroup attitudes begin with. Therefore, media contact should only lead to minor improvements for those that have had prior direct contact relative to those that have had no contact. Importantly, however, even when exposed to negative media depictions of outgroups members, having had more prior contact with outgroup members stymies the activation of negative outgroup stereotypes (Mastro & Tropp, 2004). Therefore, it seems reasonable to posit that direct contact may have a greater impact on intergroup attitudes than media contact. As such, when examining the influence of media contact on intergroup attitudes, it is important to control for participants' prior contact with outgroup members. However, as it is likely that people are experiencing both forms of contact, especially in diverse societies, it would also be of interest to examine the relative impact that both direct contact and media contact have on a person's attitudes in daily life. For instance, if direct contact has a relatively stronger impact on intergroup attitudes, might direct contact also have a more lasting impact than media contact? Past research has tended to explore contact (direct and media) at one time point, not examining its dynamic daily relationship with
intergroup attitudes. However, this an important empirical question as it may shed light on how direct contact and media contact operate when experienced together in daily life.

1.3 News Media

Past research on media contact has tended to focus only on exposure to entertainment media. However, other genres of media, such a news media, may have a strong relationship with intergroup attitudes and behaviour relative to entertainment media. Indeed, when an observed event is perceived as real – as news media typically is – it is more likely to influence social judgements and behaviour (Berkowitz & Allioto, 1973; Busselle, 2001). As such, the current research will look specifically at news media to better understand how contact with outgroup members in the news (which still falls under the umbrella of media contact) relates to attitudes towards those outgroups as a whole.

The success of intergroup contact seems to rest on the quality of that contact (Islam & Hewstone, 1993), but news media may exhibit a slight negativity bias. This may render news media contact a low quality form of contact relative to other forms of media contact or to direct contact. Indeed, roughly 50% of stories covered in the news portraying violence, conflict, or suffering, and these negative stories being presented earlier in the broadcast than other, more positive stories (Johnson, 1996). In terms of group representation, there are clear differences in the way various ethnic groups are portrayed in the media. For instance, Blacks and Latinos are over-represented as criminals while Whites are over-represented as victims (Dixon & Linz, 2000a; 2000b; Dixon, Azocar, & Casas, 2003),
and Blacks are often depicted as able-bodied, idle, and poor, rather than elderly or disabled and poor (Gilens, 1996). Importantly, these negative portrayals of ethnic groups in news media influence intergroup attitudes and behaviour. For instance, in one study, participants were shown images of Black men and women looting after hurricane Katrina. After exposure to these photos, participants showed an enhanced activation of the criminal stereotype and greater support for the negative treatment of Black individuals (Johnson, Bushman, & Dovidio, 2008). Furthermore, individuals exposed to news media depictions of terrorists attacks perpetuated by Arabs demonstrated greater prejudicial attitudes towards Arabs as a group (Das, Bushman, Bezemer, Kerkhof, & Vermeulen, 2009). Taken together, these findings demonstrate the consequences that narrow and negative media portrayals of outgroup members can have on intergroup relations. This suggests the media contact through news media, specifically, may be less effective at improving intergroup attitudes.

However, while these specifically negative portrayals may have negative consequences for intergroup attitudes, there is research supporting the notion that news media may also improve intergroup attitudes. For instance, time-series research conducted in Germany investigated immigration attitudes from 1993-2005 and found that the more immigrants were portrayed in the news, the less people agreed with anti-immigration policies (Boomgarrden & Vliegenthart, 2009). This suggests that this increased exposure to immigrants in news media may have improved attitudes towards this group, fostering more positive attitudes towards allowing newcomers into the country. This finding supports the notion that exposure to outgroup members in the news media may be an effective form of intergroup contact. Indeed, this study examined exposure to immigrants across a wide-range of news
media, without manipulating content or focusing on specific content. Perhaps then, daily exposure to outgroup members across a wide-range of news media can promote more positive intergroup attitudes. Importantly, however, Boomgarrden and Vliegenthart (2009) found that one's evaluation of an immigrant actor (negative or positive) portrayed in the news media was a relatively more important predictor of anti-immigration attitudes than the visibility of immigrant actors, with more positive evaluations predicting weaker anti-immigration attitudes. Taken together, these findings suggest that media contact may be effective at reducing prejudice and promoting a willingness for direct intergroup interaction, but that this may depend in part on the perceived positivity of the portrayals of outgroup members in news media.

1.4 Quality of Contact

Allport (1954) outlined four conditions under which intergroup contact would be successful: equal status among members of the interaction, common goals and cooperation during the interaction, and institutional (political, legal) sanction for intergroup interaction to occur. These conditions are thought to contribute to the quality of the interaction, and when they are met the interaction should be a relatively positive experience for all involved. In their 2006 meta-analysis, however, Pettigrew and Tropp determined that intergroup contact did not have to meet Allport's conditions to be effective. This is consistent with the mere exposure hypotheses which suggests that mere exposure to outgroups improves attitudes towards those groups by increasing familiarity, regardless of the valence of the exposure (Zajonic, 1968; Crisp, Young & Hutter, 2009). That being said, there is research that
suggests that particularly negative intergroup contact can actually lead to heightened feelings of prejudice (Barlow et al., 2012). Furthermore, according to the valence-salience effect, group membership becomes particularly salient during negative intergroup encounters. As such, negative intergroup interactions may counter-act the effects of positive intergroup experiences (Barlow et al., 2012; Paolini, Harwood, & Rubin, 2010).

Similar to what has been found with direct contact (Pettigrew & Tropp, 2006), media contact appears to benefit intergroup attitudes even when quality is not taken into account (Oritz & Hardwood, 2007; Schippa et al., 2005). However, when the quality of media contact is manipulated, it appears that positive media contact (i.e. positive intergroup interactions viewed via media) improves intergroup attitudes significantly relative to no media contact or to negative media contact (i.e. negative intergroup interactions viewed via media). Interestingly, however, exposure to negative media contact does not appear to lead to any change in intergroup attitudes relative to having no media contact (Joyce & Hardwood, 2012). Taken together, these findings suggests that when conducting research on intergroup contact, it is important to consider the quality of the contact situation. As suh, the current research will look at the relative negativity of direct and media contact experiences to ascertain the importance of quality during each form of contact.

1.5 Present Research

Although there appear to be differences between direct and media contact in terms of their overall impact on intergroup attitudes, research has yet to directly assess how media contact compares to direct intergroup contact in predicting daily fluctuations in intergroup attitudes. The current research
sought to bring these two spheres of research together by measuring portrayals of ingroup and outgroup categories in news media (media contact), daily social interactions (direct contact), and intergroup attitudes over a 10-day period.

Based on past literature on both direct (Pettigrew & Tropp, 2006) and media (Joyce & Harwood, 2012; Ortiz & Harwood, 2007; Schippa et al., 2006) contact, we expect that both these forms of contact will predict daily fluctuations in attitudes towards specific ethnic outgroups such that on days when participants have greater direct or media contact with members of ethnic outgroups, they will show improved attitudes towards the outgroup as a whole. However, we also predict that, in line with research suggesting that quality of the contact experience is important (Barlow et al., 2012; Paolini et al., 2010; Joyce & Harwood, 2012), this relationship will be moderated by the relative negativity of the contact experience. Specifically, we expect that on days when participants have a lot of direct or media contact with particular ethnic outgroups and perceive the social interaction or the media they viewed to be negative, there will either be no improvement or a negative change in attitudes towards those ethnic outgroups.

As a secondary research question, we are interested in the residual impact of media contact and direct contact in a given day on intergroup attitudes a subsequent day. We expect that media contact will have a short temporal impact on intergroup attitudes, and as such intergroup attitudes will be more likely to fluctuate day-to-day as a function of exposure to different ethnic groups in the media.
However, we expect that the direct contact will have more lasting temporal impact, with direct contact one day predicting intergroup attitudes the next day.

This research contributes to the literature in a number of ways. First, while most prior research on intergroup contact has only focused on one specific form of contact, we can determine the relative impact that each form of contact has on intergroup attitudes by measuring direct and media contact within participants. Furthermore, the majority of past research examining the influence of media on intergroup attitudes has focused on how very specific depictions of outgroups members in the news media influence stereotyping and attitudes. By examining media exposure in a naturalistic way, the current research will provide unique insight into how varied depictions of outgroups and intergroup relations relate to fluctuations in intergroup attitudes. Finally, past research on both direct and media contact has viewed participants' levels of contact at only one time-point – either as an amalgamation of all past contact experiences or as a manipulated one-time interaction in the lab. By using a daily dairy methodological approach, the current research will allow for a more nuanced picture of how specific contact experiences influence intergroup attitudes over the course of 10 days.
Chapter 2

Method

2.1 Participants

A community sample of 90 participants were recruited from the Greater Toronto Area of Ontario, Canada. Participants were recruited through print newspapers (i.e., the Metro, The Scarborough Mirror) and websites (i.e., Craigslist, Kijiji). Interested participants were provided with basic information via email, and were informed that the only requirement for participation was nightly internet access. Upon completion of the study, participants were compensated $30 for their participation. Data for 3 participants was not included in the final analyses as they did not complete the study, leaving a total of 87 participants (3% attrition).

The average age of the final sample was 29 years ($SD = 12.8$), and the sample had an even sex distribution (48% female, 50% male, and 2% Transgender). Twenty-nine participants listed their occupation as student. The average household income of our sample was $46,836.11 CAD. Our sample was ethnically diverse (29% White, 27% East Asian, 25% South Asian, 6% multiethnic, 4% Black, 3% Latino, 2% Arabic, and 4% unknown), reflecting the diversity of the Greater Toronto Area.
2.2 Procedure and Materials

2.2.1 Information Session and Background Survey

Interested participants attended an information session where they were given a detailed account of what the study would entail and asked to provide informed consent. After providing consent, participants were given a laminated and bound copy of the daily diary they were to complete each evening, and a trained research assistant went over important components of the diary and made sure that the participants understood the instructions. Finally, participants were asked to complete a background survey which was administered through SurveyMonkey.com, a web-based survey administration system that can encrypt participant sessions with a SSL certificate. This survey included demographic questions to assess age, gender, SES, education, and ethnicity, and a questionnaire to assess prior intergroup contact.

2.2.1.1 Ethnicity

Participants reported their ethnicity with an open-ended item. This was done to allow for a high-resolution picture of the ethnic make-up of our sample, especially given the diversity of the Toronto area. These open-ended responses were coded into 1 of 8 broader racial categories (White, Black, East Asian, South Asian, Arab, Latino, First Nation, or multiethnic), which corresponded to racial categories used with other measures in the study. This coding was done using Google Refine 2.0. This method of assessing ethnicity was used for the participant’s ethnicity and the ethnicities of social interaction partners.
2.2.1.2 Prior Quantity and Quality of Intergroup Contact

Prior intergroup contact was assessed using the intergroup contact quantity and quality measure developed by Islam and Hewstone (1993). Quantity of contact was assessed with 5-items asking how much contact the participants had with members of other ethnic groups in settings such as work, school, and outgroup members’ homes, and five items assessing the quality of these contact experiences (i.e. was it intimate, co-operative, etc.). Participants answered these questions using a 7-point Likert scale (quantity: 1 = none at all to 2 = a great deal; quality: 1 = strongly disagree to 7 = strongly agree). Each scale had good internal reliability ($\alpha_{\text{quantity}} = .81$, $\alpha_{\text{quality}} = .84$). Means were computed for quantity and quality of intergroup contact, respectively.

2.2.2 Daily Diary

Starting the evening following their information session, for 10 evenings, participants completed a 15-minute “diary-like” survey where they reported on their exposure to news media and their social interactions that day. Participants received links to these diaries around 6:00 pm in the evening and were asked to complete the diaries the evening they received them and by no later than 9:00 am the next morning.

2.2.2.1 Time Consuming Media

To capture the amount and variety of news media participants were exposed to each day, respondents
recorded (in hours and minutes) how much time they spent reading print news media, viewing broadcast (television) news media, listening to radio news media, and/or viewing/reading internet news media, and they were asked to list each source they were exposed to.

2.2.2.2 Media Contact

Participants reported on the amount of information covered in the news media they viewed that day on 7 different ethnic groups (White, Black, East Asian, South Asian, Arab, Latino, First Nation), using an 11-point Likert scale ranging from 0 (none) to 10 (a lot).

2.2.2.3 Quality of Media Contact

A number of questions designed to measure participants daily perceptions of the media were included. Specifically, participants were told to think about all of the news media they encountered that day (and that day only) and to answer 5-questions about its content which included: “how much violence was depicted?”, “how much conflict was depicted?”, “how much cooperation/problem solving was depicted?” (reverse-coded), “how uplifting were the stories depicted?”(reverse-coded), and “how threatening were the stories depicted?”. Participants responded on an 11-point Likert scale from 0 (not at all/none) to 10 (very/a lot) and responses to these items were averaged to create a composite score measuring the perceived negativity of media each day, with higher scores indicating more perceived negativity in the media (\(\alpha = .77\)). This score was used as a proxy for determining the quality of the media contact experience, allowing us to examine if this moderates the relationship of
media contact with improved intergroup attitudes and intergroup anxiety.

2.2.2.4 Time Interacting

Participants reported on each direct social interaction (these could be face-to-face or over the phone) they had that day and the duration of the interaction (in minutes). It was explained to them during the information session that only interactions that last 10 minutes or longer should be reported. The time spent in each interaction in a given day were summed to create an overall duration of interaction variable.

2.2.2.5 Direct Contact

When reporting on their social interactions, participants were asked for demographic information about their interaction partner (age, sex, sexual orientation, and ethnicity). Ethnicity was reported with an open-ended response and the ethnicities of interaction partners were coded into one of eight broader racial categories (the same used to code participant ethnicity). To determine the quantity of intergroup interactions each day, the number of intragroup and intergroup interactions that the participant had were counted.

2.2.2.6 Quality of Direct Contact

To capture the quality of each interaction experience, participants were asked to indicate how happy
(reverse-coded), angry, relaxed (reverse-coded), and anxious they felt during the interaction using a 7-point Likert scale from 1 (not at all) to 7 (very). These ratings had good internal consistency ($\alpha = .78$). A mean score was calculated for each interaction experience with higher scores indicating greater negativity of the interaction experience.

### 2.2.2.7 Intergroup Attitudes

To measure intergroup attitudes, a feeling thermometer was included. Participants were asked to respond to a single item asking how warm they felt towards 7 different ethnic groups (White, Black, East Asian, South Asian, Latino, Arabic, and First Nations). They responded using an 11-point Likert scale, ranging from 0 (freezing cold) to 10 (boiling hot).

Upon completion of the 10 daily diaries, participants were invited back to the lab, thanked, compensated, and debriefed.

## Chapter 3

### Results

As days are nested within participants and perceptions of multiple ethnic groups are nested within days, the `lme` function (Pinheiro, Bates, DebRoy, & Sarkar, 2013) of R 2.10 was used to run a 3-level multilevel model that would take this covariance structure into account. A random intercept was
modeled for each day within each participant and for each participant, using the between-within method of determining degrees of freedom and an unstructured covariance matrix (Schluchter & Elashoff, 1990).

### 3.1 Preliminary analyses

Participants reported seeing more information about outgroup members ($M = 5.77$) relative to ingroup members ($M = 3.22$) in the news each day, which makes sense given the diversity of our sample and the number of outgroups reported on relative to ingroups. However, consistent with past research on daily intergroup interactions (Page-Gould, 2012), more intragroup interactions (57.8%) were reported than intergroup interactions (42.1%), $t(794) = 4.56$, $p = <.001$.

On average, participants spent 151.53 ($SD = 167.89$) minutes consuming media each day. Furthermore, participants spent the most time consuming internet media ($M = 65.66$, $SD = 92.79$) followed by broadcast media ($M = 46.09$, $SD = 70.49$), print media ($M = 26.8$ $SD = 44.06$), and radio media ($M = 20.35$, $SD = 41.83$). Participants engaged in 1.91 ($SD = 1.64$) interactions in a given day and spent about 14.16 minutes ($SD = 12.8$) engaged in an interaction. A paired $t$-test was run to compare the amount of time participants spent participating in direct interactions and the amount of time they spent consuming media. Results indicated that participants spent significantly more time consuming media than they did participating in direct social interaction, $t(5564) = -60.76$, $p = <.001$. 
The means for prior contact quantity ($M = 4.37$, $SD = 1.03$) and quality ($M = 4.92$, $SD = 0.87$) were significantly higher than the mid-point of the scale (quantity: $t(86) = 3.83, p = <0.001$. quality: $t(87) = 9.64, p = <0.001$), and the quantity and quality of prior intergroup contact were positively correlated, $r(84) = .52, p = <.001$.

### 3.2 Contact and Intergroup Attitudes

I wanted to determine the unique relationships of media contact and direct contact with intergroup attitudes. Daily attitudes towards each ethnic group were modeled as functions of the interaction between time consuming media, media contact, and group context (-1 = ingroup, 1 = outgroup) plus the interaction between time interacting, direct contact, and group context (ingroup or outgroup), while controlling for age, sex, ethnicity, and quantity and quality of prior intergroup contact. By including both media contact and direct contact in the same model, the unique effects for each type of contact are tested. All continuous variables were mean-centered prior to analysis. The full results for this model are presented in Table 1.

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1 A second model was run that did not control for age, sex, or ethnicity, and a likelihood ratio test was run to compare the results of this model with the model including these covariates. This test determined that the model controlling for age, sex, and ethnicity explained significantly more of the variance in our data that the model that did not include these covariates, $X^2(3) = 602.07, p = <.001$. As such, all models reported include these covariates.
Table 1

*Model estimates of daily attitudes towards each ethnic group as functions of the interaction between time consuming media, media contact, and intergroup context plus the interaction between time interacting, direct contact, and group context*

<table>
<thead>
<tr>
<th>Effect</th>
<th>b (SE)</th>
<th>t(df)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Intercept</td>
<td>3.438(1.494)</td>
<td>2.30(3534)*</td>
</tr>
<tr>
<td>Age</td>
<td>-0.041(0.018)</td>
<td>-2.34(69)*</td>
</tr>
<tr>
<td>Sex</td>
<td>0.889(0.413)</td>
<td>2.15(69)*</td>
</tr>
<tr>
<td>Race</td>
<td>-0.229(0.121)</td>
<td>-1.90(69)</td>
</tr>
<tr>
<td>Prior Contact Quantity</td>
<td>0.277(0.250)</td>
<td>1.11(69)</td>
</tr>
<tr>
<td>Prior Contact Quality</td>
<td>0.654(0.308)</td>
<td>2.12(69)*</td>
</tr>
<tr>
<td>MC</td>
<td>0.069(0.014)</td>
<td>5.08(3534)**</td>
</tr>
<tr>
<td>TCM</td>
<td>-8.92×10^-4 (4.23×10^-4)</td>
<td>-2.11(528)*</td>
</tr>
<tr>
<td>DC</td>
<td>0.138(0.043)</td>
<td>3.23(3534)**</td>
</tr>
<tr>
<td>TI</td>
<td>-0.001(0.005)</td>
<td>-0.25(528)</td>
</tr>
<tr>
<td>Group Context</td>
<td>-0.260(0.087)</td>
<td>-2.98(3534)**</td>
</tr>
<tr>
<td>MC x TCM</td>
<td>7.5x10^-5 (8.37x10^-5)</td>
<td>0.90(3534)</td>
</tr>
<tr>
<td>MC x Group Context</td>
<td>0.022(0.013)</td>
<td>1.72(3534)</td>
</tr>
<tr>
<td>TCM x Group Context</td>
<td>-4.34×10^-4 (2.77×10^-4)</td>
<td>-1.57(3534)</td>
</tr>
<tr>
<td>DC x TI</td>
<td>-6.9×10^-5 (2.07×10^-4)</td>
<td>-0.033(3534)</td>
</tr>
<tr>
<td>DC x Group Context</td>
<td>0.102(0.043)</td>
<td>2.36(3534)*</td>
</tr>
<tr>
<td>TI x Group Context</td>
<td>0.002(0.005)</td>
<td>0.49(3534)</td>
</tr>
<tr>
<td>MC x TCM x Group Context</td>
<td>1.6×10^-4 (7.07×10^-3)</td>
<td>2.03(3534)*</td>
</tr>
<tr>
<td>DC x TI x Group Context</td>
<td>-0.001(0.002)</td>
<td>-0.64(3534)</td>
</tr>
</tbody>
</table>

MC = Media Contact, TCM = Time Consuming Media, DC= Direct Contact, TI = Time Interacting* p = <.05, ** p = <.01
3.2.1 Media Contact

The model revealed a significant main effect for media contact with a particular ethnic group to predict more positive attitudes towards that ethnic group, $b = 0.069$, $SE = 0.014$, $t(3534) = 5.08$, $p < 0.001$. However, this main effect was moderated by time consuming media and group context, $b = 1.6 \times 10^4$, $SE = 7.07 \times 10^{-3}$, $t(3534) = 2.03$, $p = 0.04$. To breakdown this three-way interaction, simple slope analyses were conducted by examining the slopes at 1 SD above and below the mean for time consuming media (Aiken & West, 1991). When time consuming media was high, a significant interaction between media contact and group context (ingroup or outgroup) emerged, $b = .049$, $SE = 0.018$, $t(3527) = 2.75$, $p = 0.006$, but this interaction did not emerge when the time consuming media was low, $b = -.004$, $SE = 0.019$, $t(3537) = -.24$, $p = .81$ (see Figure 1). Group context, being a categorical variable, was dummy-coded to examine these effects separately for media targets that were ingroup and outgroup members (Aiken & West, 1991). Specifically, when time consuming media was high, media contact with ingroup members did not predict a change in attitudes towards the ingroup, $b = 0.033$, $SE = 0.034$, $t(3537) = .96$, $p = .34$, however, media contact with outgroup members predicted improved attitudes towards those outgroups, $b = 0.131$, $SE = 0.013$, $t(3537) = 10.46$, $p < .001$ (see Figure 2).

3.2.2 Direct Contact

The model revealed a significant main effect for direct contact with a particular ethnic group to predict more positive attitudes towards that ethnic group, $b = 0.138$, $SE = 0.043$, $t(3534) = 3.23$
<0.001 and this was moderated by group context (ingroup or outgroup),  $b = .102, SE = 0.043$
$t(3534)= 2.36 ~ p = 0.02$, but not by time interacting, $b = -.001, SE = 0.002 ~ t(3534)= -0.64 ~ p = 0.52$.

Again, group context was dummy-coded to examine the simple effects separately for interaction targets that were ingroup or outgroup members. These analyses revealed direct contact with ingroup members did not predict fluctuations in attitudes towards the ingroup, $b = 0.034, SE = 0.057, t(3573) = .61 ~ p = 0.54$, but that direct contact with outgroup members predicted more positive attitudes towards those outgroups, $b = 0.222, SE = 0.047 ~ t(3573)= 4.74, ~ p = <.001$ (see Figure 3).

![](image.png)

Figure 1. Attitudes towards groups as a function of media contact and group context (ingroup or outgroup) when time consuming media is low (1 $SD$ below the mean)
Figure 2. Attitudes toward groups as a function of media contact and group context (ingroup or outgroup) when time consuming media is high (1 SD above the mean).

Figure 3. Attitude toward groups as a function of direct contact and group context (ingroup or outgroup).
3.3 Quality of Contact

Another goal of this study was to examine whether the quality of the contact experience moderates the relationship between media and direct contact with intergroup attitudes. Daily attitudes towards each ethnic group were modeled as functions of the interaction between time consuming media, media contact, group context, and the negativity of media plus the interaction between direct contact, group context, and negativity of interactions, while controlling for age, race, sex, and the quantity and quality of prior intergroup contact. The full results for this model are presented in Table 2.

3.3.1 Media Contact

The main effect of negativity of media was not a significant predictor of daily intergroup attitudes, $b = -0.056$, $SE = 0.040$, $t(503) = -1.38$, $p = .17$, and negativity of media did not moderate the relationship between media contact and intergroup attitudes, $b = -3.5\times10^{-5}$, $SE = 5.06\times10^{-5}$, $t(3397) = -0.70$, $p = .49$.

3.3.2 Direct Contact

The model revealed no significant main effect for negativity of interactions to predict attitudes, $b = -0.091$, $SE = 0.055$, $t(503) = -1.65$, $p = .10$, however, the 3-way interaction of negativity of interactions, direct contact, and group context emerged, $b = -0.070$, $SE = 0.032$, $t(3397) = 2.14$, $p = .03$. Simple slope analyses were conducted by examining the slopes at 1 $SD$ above and below the mean.
for negativity of interactions. This revealed that when interactions where low in negativity there was 
no interaction between direct contact and group context in predicting intergroup attitudes, \( b = -0.004, \)
\( SE = 0.049, t(3536) = -0.08, \ p = .94 \) (see Figure 4), however, when interactions were high in 
negativity, this interaction emerged, \( b = .151, SE = 0.056, t(3536) = 2.71, \ p = .007. \) Specifically, 
when the negativity of the interaction experience was high, direct contact with ingroup members did 
not predict a change in attitudes towards the ingroup, \( b = 0.086, SE = 0.093, t(3536) = 0.92, \ p = .36, \)
however, rather counterintuitively, direct contact with outgroup members predicted improved attitudes 
towards those outgroups, \( b = 0.387, SE = 0.060, t(3536) = 6.55, \ p = <.001 \) (see Figure 5).
Importantly, the main effect of direct contact with outgroup members to predict more positive 
attitudes towards these outgroups remains even though negativity of the interaction is included in 
model, \( b = 0.120, SE = 0.047, t(3403) = 4.22, \ p = <.001. \)

**Table 2**

*Model estimates of daily attitudes towards each ethnic group as functions of the interaction between*

*time consuming media, media contact, intergroup context, and negativity of media plus the*

*interaction, direct contact, group context, and negativity of interactions*

<table>
<thead>
<tr>
<th>Effect</th>
<th>( b ) (SE)</th>
<th>( t(df) )</th>
</tr>
</thead>
<tbody>
<tr>
<td>Intercept</td>
<td>3.609(1.486)</td>
<td>2.43(3397)*</td>
</tr>
<tr>
<td>Age</td>
<td>-0.040(0.018)</td>
<td>-2.30(69)*</td>
</tr>
<tr>
<td>Sex</td>
<td>0.859(0.411)</td>
<td>2.09(69)*</td>
</tr>
<tr>
<td>Race</td>
<td>-0.223(0.120)</td>
<td>-1.85(69)</td>
</tr>
<tr>
<td>Prior Contact Quantity</td>
<td>0.282(0.249)</td>
<td>1.13(69)</td>
</tr>
<tr>
<td></td>
<td>Value 1</td>
<td>Value 2</td>
</tr>
<tr>
<td>---------------------------</td>
<td>--------------------------</td>
<td>---------</td>
</tr>
<tr>
<td>Prior Contact Quality</td>
<td>0.623(0.306)</td>
<td>2.03(69)*</td>
</tr>
<tr>
<td>MC</td>
<td>0.068(0.015)</td>
<td>4.54(3397)**</td>
</tr>
<tr>
<td>TCM</td>
<td>-7.79×10^{-4} (4.63×10^{-4})</td>
<td>-1.68(503)**</td>
</tr>
<tr>
<td>MN</td>
<td>-0.056(0.04)</td>
<td>-1.38(503)</td>
</tr>
<tr>
<td>QI</td>
<td>0.121(0.038)</td>
<td>3.23(3397)**</td>
</tr>
<tr>
<td>IN</td>
<td>-0.091(0.055)</td>
<td>-1.64(503)</td>
</tr>
<tr>
<td>Intergroup Context</td>
<td>-0.30(0.086)</td>
<td>-3.49(3534)**</td>
</tr>
<tr>
<td>MC x TCM</td>
<td>1.5×10^{-5}(8.90×10^{-5})</td>
<td>0.17(3397)</td>
</tr>
<tr>
<td>MC x Intergroup Context</td>
<td>0.013(0.014)</td>
<td>.93(3397)</td>
</tr>
<tr>
<td>TCM x Intergroup Context</td>
<td>-3.95×10^{-4} (2.96×10^{-4})</td>
<td>-1.33(3397)</td>
</tr>
<tr>
<td>MC x MN</td>
<td>0.005(0.008)</td>
<td>0.68(3397)</td>
</tr>
<tr>
<td>Intergroup Context x MN</td>
<td>0.056(0.026)</td>
<td>2.14(3397)*</td>
</tr>
<tr>
<td>TCM x MN</td>
<td>-1.09×10^{-4} (2.63×10^{-4})</td>
<td>-0.42(503)</td>
</tr>
<tr>
<td>DC x Intergroup Context</td>
<td>0.072(0.038)</td>
<td>1.89(3397)</td>
</tr>
<tr>
<td>DC x IN</td>
<td>0.100(0.032)</td>
<td>3.14(3397)**</td>
</tr>
<tr>
<td>Intergroup Context x IN</td>
<td>-0.011(0.039)</td>
<td>-0.29(3397)</td>
</tr>
<tr>
<td>MC x TCM x Intergroup Context</td>
<td>1.68×10^{-4} (8.50×10^{-4})</td>
<td>1.97(3397)*</td>
</tr>
<tr>
<td>MC x TCM x MN</td>
<td>4.2×10^{-5}(5.18×10^{-5})</td>
<td>0.812(3397)</td>
</tr>
<tr>
<td>MC x Intergroup Context x MN</td>
<td>0.003(0.008)</td>
<td>0.41(3397)</td>
</tr>
<tr>
<td>DC x Intergroup Context x IN</td>
<td>0.070(0.032)</td>
<td>2.14(3397)*</td>
</tr>
<tr>
<td>MC x TCM x Intergroup Context MN</td>
<td>-3.5×10^{-5} (5.06×10^{-5})</td>
<td>-0.70(3397)</td>
</tr>
</tbody>
</table>

MC = Media Contact, TCM = Time Consuming Media, MN= Media Negativity, DC= Direct Contact, IN = Interaction Negativity * p = <.05, ** p = <.01
Figure 4. Attitudes toward groups as a function of direct contact and group context (ingroup or outgroup) when negativity of interaction is low (1 SD below the mean).

Figure 5. Attitudes toward groups as a function of direct contact and group context (ingroup or outgroup) when negativity of interaction is high (1 SD above the mean).
3.4 Comparing Models

In order to determine which of the two models presented fits our data best, the Bayesian Information Criterions (BICs) of each model were compared (Raftery, 1995), with lower BICs indicating better model fit. Our first model had a BIC of 14801.63 which was greater than the second model, which had a BIC of 14514.89; a difference of 286.74. Therefore, the second model including negativity of media and direct contact appears to fit the data best. Furthermore, a likelihood ratio test was performed and demonstrated that the second model that included a moderator variable for negativity of direct contact and media contact fit the data significantly better than the first model that did not include these moderator variables, $\chi^2(8) = 565.58, p = <.001$.

3.5 Residual Impact

To examine the residual impact of media contact and direct contact within a given day on intergroup attitudes on the subsequent day, lagged variables were created for all media contact and direct contact predictors. A lagged analyses spreadsheet was set up that contained “current” variables and “lagged” variables, with lagged variables representing the values of the predictor variables the day before.

To examine whether media contact and direct contact with particular ethnic groups one day would predict fluctuations in attitudes towards those ethnic groups the next day, daily intergroup attitudes were modeled as a function of the interaction between the lagged time consuming media variable, the
lagged media contact variable, and group context plus the interaction between the lagged direct contact variable and group context, while controlling for the same variables on the current day, and controlling for age, race, sex, and the quality and quantity of prior intergroup contact.

### 3.5.1 Media Contact

A significant main effect for media contact the day before (lagged variable) to predict a change in attitudes towards the group was found, $b = 0.033, SE = 0.017$, $t(3395) = 1.92$, $p = .05$, however, this was not moderated by quantity of media consumed or by group context (ingroup or outgroup), $b = -2.9 \times 10^{-5}, SE = 9.6 \times 10^{-5}$, $t(3395) = .30$, $p = .76$. Indeed, the media contact on the current day was a stronger predictor of attitude change towards the group, $b = -0.047, SE = 0.017$, $t(3395) = 2.70$, $p = .007$, and consistent with my initial analyses, this was moderated by time consuming media and group context (ingroup or outgroup), although the interaction was only marginally significant, $b = 1.8 \times 10^{-4}$, $SE = 9.75 \times 10^{-5}$, $t(3395) = 1.85$, $p = .06$.

### 3.5.2 Direct Contact

There was no significant main effect for direct contact the day before to predict a change in attitudes towards the group on the current day, however, a significant two-way interaction emerged between the direct contact the day before and group context (ingroup or outgroup), $b = 0.118, SE = 0.049$, $t(3395) = 2.42$, $p = .02$. Simple slopes analyses revealed that direct contact with ingroup members
did not predict improved attitudes towards the ingroup, $b = -0.034, SE = 0.073, t(3395) = -0.47, p = .64$, however, direct contact with outgroup members predicted improved attitudes towards outgroups, $b = 0.203, SE = 0.065, t(3395) = 3.10, p = .002$. Interestingly, when controlling for direct contact the day before, direct contact on the current day is no longer a significant predictor of improved attitudes towards the group, $b = 0.065, SE = 0.050, t(3395) = 1.29, p = .20$, as it was in our initial model. Furthermore, the interaction between direct contact on the current day and group context (ingroup or outgroup) is not significant, $b = 0.035, SE = 0.050, t(3395) = .69, p = .48$.

Figure 6. Attitudes toward groups as a function of direct contact the day before (lagged variable) and group context (ingroup or outgroup).
Chapter 4
Discussion

The current research sheds some light on the dynamic relationships between daily experiences of direct and media contact with intergroup attitudes. The data presented here provide evidence that daily exposure to outgroup members in the news media may serve as a form of intergroup contact, improving intergroup attitudes independently of direct contact. In diverse societies where people may be engaging in direct social interaction with outgroup members and consuming media depicting members of these outgroups, this research demonstrates that both contact experiences have independent influences on intergroup attitudes.

This research adds to the growing literature on contact theory (Allport, 1954; Pettigrew & Tropp, 2006) by providing empirical support for two forms of intergroup contact. First, consistent with past research, this study demonstrated that social interaction with outgroup members predicts improved attitudes towards the outgroup as a whole. However, while research has tended to focus on participants' self-reported past intergroup contact, this study provides a unique contribution to the contact literature by examining how daily reports of intergroup contact experiences facilitate changes in intergroup attitudes over a 10-day period. Moreover, this paper provides empirical support for the theory that media contact may predict improved intergroup attitudes similarly to direct contact, and it may do so regardless of the valence of the media being consumed.
Our primary research question concerned whether experiencing direct and/or media contact within a given day would predict daily fluctuations in intergroup attitudes. As expected, we found that daily experiences of direct and media contact predicted improved intergroup attitudes. Interestingly, however, only participants that consumed a high quantity of media actually demonstrated improved attitudes towards outgroups when they reported seeing a great deal of information about those outgroups in the media (media contact). However, the duration of time spent in social interaction did not moderate the relationship between direct contact and intergroup attitudes. It may be that engagement with media is a relatively passive task and as such, participants have to spend more time connecting with outgroups via mediums. Alternatively, it may be that group context (ingroup or outgroup) is less salient via media and as such, participants need to spend more time consuming media to reap the benefits of intergroup contact.

We were also interested in how important the quality of media and direct contact would be in determining intergroup attitudes. It was found that the relationship between exposure to ethnic outgroups in the media and improved intergroup attitudes was not moderated by the perceived negativity of the contact experience, suggesting that consistent with past research, mere exposure to outgroups in the news is sufficient to improve attitudes towards those groups (Zajonic, 1968; Crisp et al., 2009). This makes sense when we consider the fact that the amount of time spent consuming media was an important variable moderating the media contact and intergroup attitude relationship.
Indeed, it is likely that the more time people spend consuming media, the more likely they are to repeatedly be exposed to outgroup members, which according to the mere exposure effect, should lead to great liking (Zajonic, 1968; Crisp et al., 2009). However, perceived negativity of direct contact experiences moderated the relationship between direct contact and intergroup attitudes such that more negative intergroup contact actually lead to improved intergroup attitudes. It is difficult to fully explain this finding, as most past research suggests that negative direct contact has a negative relationship with intergroup attitudes (Barlow et al., 2012). However. It is important to point out that the main effect of direct contact in predicting improved intergroup attitudes remained when including perceived negativity of the interaction as a moderator. This suggests that high levels of negative and positive contact with outgroup members both improve attitudes, but when the contact is negative it is particularly important to have more contact.

A final model was run to examine the residual impact that direct and media contact on a given day would have on intergroup attitudes on a subsequent day. Results indicated that media contact has the greatest impact on intergroup attitudes within the current day, but little or no residual impact, while direct contact has greater residual impact on intergroup attitudes such that direct contact on a given day is a stronger predictor of intergroup attitudes on a subsequent day than direct contact on that day. This suggests that the effects on direct contact last longer than the effects of media contact.
4.1 Limitations and Future Directions

While these results are encouraging as they suggest that both direct and media contact independently predict improved intergroup attitudes, several methodological limitations should be acknowledged. Although the contact literature posits a causal relationship, suggesting that direct (Pettigrew, Tropp, Wagner, & Christ, 2011) and media contact (Mazziotta et al., 2011) lead to improvements in intergroup attitudes, the data we collected here are inherently correlational. As the amount of exposure people had to various ethnic groups in the media (media contact) and their direct contact with ethnic groups were not manipulated in the current study, we are not able to determine the causal relationship between either of these forms of contact and intergroup attitudes. It may be that people that report more positive intergroup attitudes towards particular outgroups are (1) also more comfortable interacting with members of those outgroups and (2) more interested in consuming media about those ethnic outgroups. Furthermore, because contact with outgroups via media may be easier to avoid than direct interaction (sometimes you have to interact with outgroup members in the workplace, school, retail settings, etc.) those with negative intergroup attitudes may actively avoid consuming media regarding outgroups. Future research on media contact could use a similar paradigm to observe daily fluctuations in intergroup attitudes but could manipulate the media participants are exposed to each day. This would allow one to determine whether contact with these outgroup actually leads to improved intergroup attitudes.
Furthermore, participants may be exposed to information on different ethnic groups, but not consciously recognize and recall this when completing their diaries. As such, this self-report measure used in our diaries may not fully capture the subtleties of media contact. Indeed, there is evidence to suggest that people unconsciously pick up on subtle, non-verbal cues when viewing media and that these may affect their implicit and explicit intergroup attitudes (Weisbach, Pauker, & Ambady, 2009). Perhaps people unconsciously pick up on a great deal of information when they view media each day, but their biases determine what information is processed, stored, and recalled later (when completing the diaries). That does not, however, mean that the information that was not readily recalled had no influence on their attitudes. Future research should carefully unpack how explicit verbal statements and implicit nonverbal cues consumed via media interact in determining intergroup attitudes.

Moreover, the way that perceived negativity of direct and media contact were operationalized may not have accurately captured these variables. In particular, the variables for perceived negativity of media captured participants' perceptions of all the media they consumed within that day, and did not account for each media contact experience. As such, it may not have captured the nuances of how media contact quality influences intergroup attitudes. Future research should attempt to examine media contact experiences similar to the way direct contact experiences were measured in the current study – by having participants recall each media contact experience they had (each story they read, watched, viewed, etc.) and report specifically on those experiences. This would be difficult to accomplish with a diary study, as it may be too cognitively taxing to have participants recall all media contact
experiences at the end of a day, but experience-sampling methods that have participants recall these experiences throughout the day could ameliorate this problem.

Reporting on each media contact experience may also allow us to glean important information regarding which types of media contact are most effective and when each type of media contact is effective. Indeed, media contact may be comprised of two subcategories of indirect contact: Parasocial contact and vicarious contact. These forms of contact are similar in that they both are experienced via media, and they both seem to lead to improvements in intergroup attitudes (Gomez & Huici, 2008; Mazziotta et al., 2011; Ortiz & Harwood, 2007; Schippa, et al., 2005; 2006). However, these two forms of contact have important differences. Vicarious contact suggests that being exposed to an ingroup member having a positive social interaction is a learning process. Via a positive ingroup exemplar, people can learn both that intergroup contact can be positive and how they should act during intergroup interaction, reducing their anxiety about participating in an intergroup interaction (Mazziotta et al., 2011). Parasocial contact, on the other hand, is the illusion of having a one-on-one interaction with an outgroup member (Horton & Wohl, 1956; Schippa et al., 2005). This may lead one to identify with an outgroup member (Ortiz & Harwood, 2007), and to feel more capable of participating in direct intergroup interaction. Future research should disentangle these two processes to ascertain the mechanisms by which each process operates and when each process is effective at improving intergroup attitudes (i.e. what contextual and individual differences may uniquely moderate the relationship between vicarious or parasocial contact with intergroup attitudes).
Finally, the current research focused specifically on news media, which we argued was important as a great deal of past research on media contact has only focused on entertainment media (Schippa et al, 2006, Ortiz & Harwood, 2007). However, news media and entertainment media may be experienced and interpreted rather differently, and this could alter if and when each form of media is useful for media contact. Furthermore, there is some empirical evidence to suggest that, as people have a great deal of choice regarding what media they consume, content preferences dictate which type of media people consume (Prior, 2005). These differences in content preferences may relate to stable, individual differences in those that consume a great deal of news media relative to those that consume more entertainment media or no media. Future research should examine entertainment and news media consumption within participants to determine how each form of media differ when examined within the media contact framework.

4.2 Conclusion

Research on intergroup contact has been promising, suggesting that intergroup attitudes may be improved through both direct and indirect forms of intergroup contact (Crisp et al, 2007; Mazziotta et al., 2011; Pettigrew & Tropp, 2006; Schippa et al, 2006; Wright et al., 1997) Importantly, these improvements may occur regardless of the quality of the contact experience (Pettigrew & Tropp, 2006). The current research contributed to this literature by demonstrating the dynamic relationship of
media contact and direct contact with intergroup attitudes. Indeed, media contact and direct contact both predicted improved intergroup attitudes, and the contact experiences did not need be positive for this relationship to emerge. This research carries a few important implications for practical applications of this work. First, if media contact is an anxiety free way to interact with outgroup members, it could be a particularly important form of contact for prejudiced individuals. As such, careful consideration should be given to the diversity of groups presented across mainstream media. However, the current research suggests that while media contact is effective at changing intergroup attitudes in the short-term, it may have less of a temporal impact on intergroup attitudes than direct contact. With that in mind, researchers must consider the ways by which media contact not only promotes positive intergroup attitudes, but also encourages a willingness to engage in direct intergroup contact.
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